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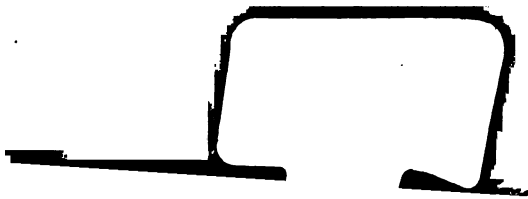
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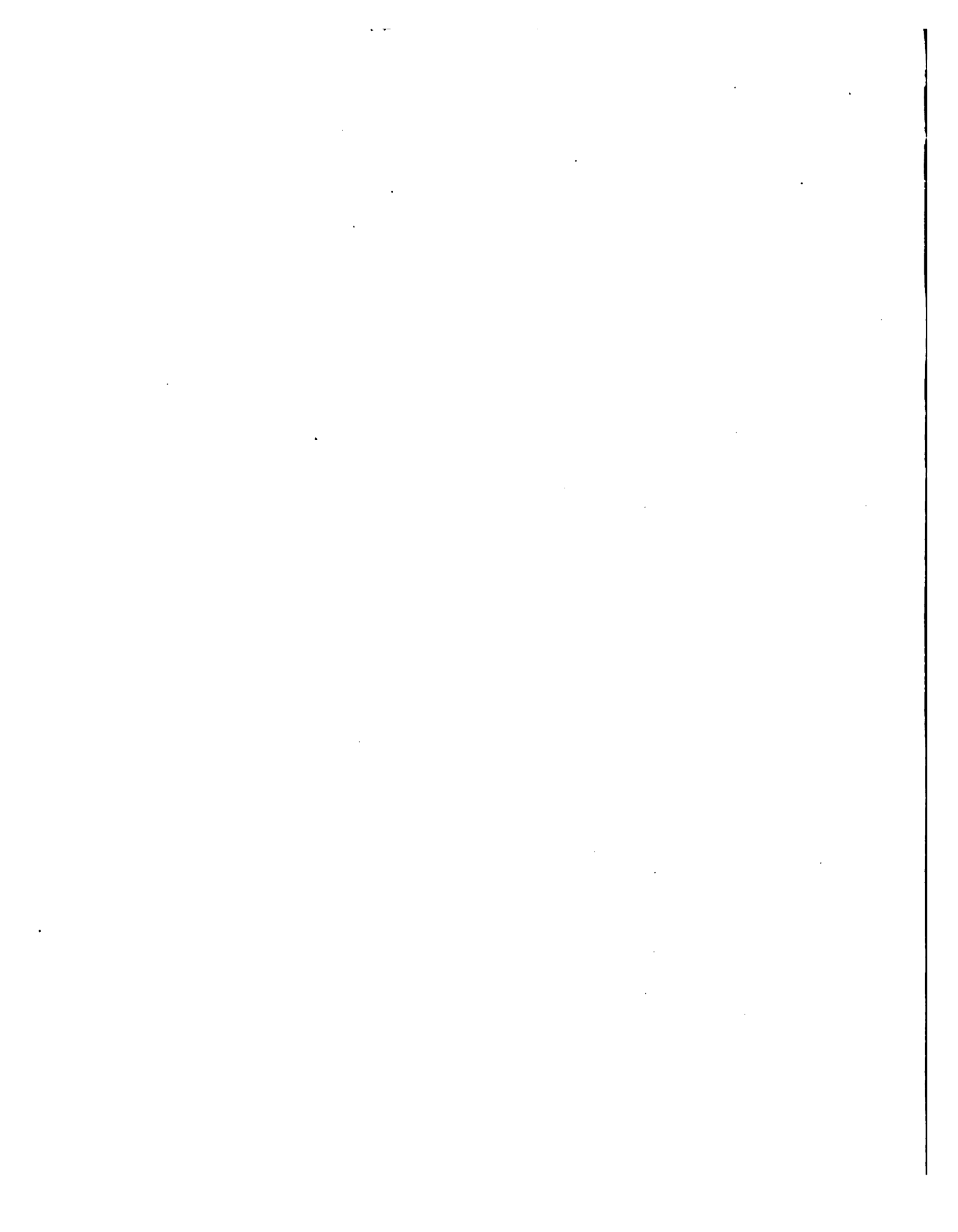
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OBSERVATIONS
ON A
T O U R
THROUGH
THE HIGHLANDS
AND PART OF THE
WESTERN ISLES
OF
SCOTLAND;

PARTICULARLY
STAFFA AND ICOLMKILL:
TO WHICH ARE ADDED,
A DESCRIPTION OF THE FALLS OF THE CLYDE,
OF THE COUNTRY ROUND MOFFAT,
AND AN
ANALYSIS OF ITS MINERAL WATERS.

BY T. GARNETT, M. D.

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LONDON; THE ROYAL IRISH ACADEMY; AND PROFESSOR OF NATURAL
PHILOSOPHY AND CHEMISTRY IN THE ROYAL
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OBSERVATIONS

ON A

TOUR

THROUGH THE HIGHLANDS,

&c. &c.

INVERNESS is a large and well built town, containing about 8000 inhabitants. The houses are very lofty, and many of them elegant. It is very properly called the Capital of the Highlands, there being no other town of any consequence in the north. There are some very good inns: that, where we took up our abode, is kept by a Mrs. Ettles. Our accommodation was very good; we experienced much attention and civility, and were charged very reasonably. Almost opposite to our inn, near the centre of the town, stands the court-house, with which is connected the jail or tolbooth. It is a very handsome modern building, with an elegant tower, terminated by one of the handsomest spires I have seen. The prison is airy, and kept remarkably neat.

THE town is governed by a provost, four bailies, and a dean of guild, assisted by a council consisting of twenty-one members, called the town council. The new council are elected every year by the old, before their office expires. The new council elect from their number, the provost, bailies, dean of guild, and a treasurer. There are six corporations of craftsmen, besides several crafts not incorporated.

IT would be unpardonable not to mention the academy, an excellent institution, which was established here in the year 1790. The gentlemen of this and some of the neighbouring counties, had long considered the establishment of a seminary of learning, on a liberal and extensive plan, of very great importance to this part of the country. A committee having been appointed, in the year 1787, to consider of the most proper methods for carrying it into effect, immediately commenced an extensive correspondence, and subscriptions were opened in Scotland, England, France, America, and the East and West Indies; in all of which natives of this country were settled. A piece of ground containing about three acres, was purchased, and an elegant building erected, consisting of a large public hall, with six very spacious apartments for the accommodation of the different classes, the library, and philosophical apparatus. The business is conducted by a rector and four tutors.

IN the first class the English language is taught grammatically; in the second, Latin and Greek; in the third, arithmetic and

book-keeping ; in the fourth, the elements of Euclid, with their application to plane and spherical trigonometry, mensuration of solids and surfaces in all its parts ; geography, with the use of the globes ; navigation, and the most useful parts of practical astronomy ; naval, civil, and military architecture ; practical gunnery ; perspective, and drawing. In the fifth, or highest, which is the rector's class, are taught civil and natural history, experimental philosophy, and chemistry.

THE rector has a house and small salary ; the different tutors have likewise small salaries, so that they depend chiefly on the fees of their different classes, which make them much more attentive and industrious. The fees for each session are, to the master of the first class, six shillings ; to the master of the second twelve shillings ; the same to the master of the third ; the fee for each session to the master of the fourth, is one guinea : and to the master of the highest class, a guinea and a half. Besides these fees, there is a small sum paid by every student attending the academy to the rector.

THE number of students is generally between two and three hundred. The year is divided into two terms or sessions : the first begins the 16th of July, and ends on the 20th of December ; the second begins on the fifth of January, and ends on the tenth of June.

THE directors of the academy are the provost, bailies, dean of guild, sheriff of the county, and the moderator of the presbytery of Inverness. Subscribers of 50*l.* are likewise directors for life; and subscribers to the amount of 100*l.* are perpetual directors, *i. e.* the direction is continued to their heirs and assigns. Besides these directors, five gentlemen of the county are annually elected at the Michaelmas head-court. At the desire of the Highland Society of London, a class has been opened for teaching the Gaelic language, with a salary of fifteen pounds per annum, to which the directors have added sixteen pounds*.

THIS useful institution possesses many advantages. The situation of Inverness is in the midst of an extensive country; the town is pleasantly situated, healthy, and not too large; board is likewise very reasonable. From the popular way in which the directors are appointed, as well as from their respectability, they are likely to keep up the spirit of it, and prevent abuses. Though it has not the name, it possesses most of the advantages of an university, and may serve as a place of complete education for all, excepting those intended for the learned professions, who may here lay an excellent foundation, and raise the superstructure at Edinburgh or Glasgow. I do not mention Aberdeen or St. Andrew's, because though education is, I believe, very well conducted in them both, and particularly in the former, they are, notwithstanding the name, more to be considered in the light of the seminary of Inverness, because none intended for

* Stat. Account of Inverness

the learned professions, excepting the church, can finish their education there.

I CANNOT avoid observing here, that the inhabitants of North Britain have much juster and more liberal ideas of education than my countrymen; and I cannot but express a wish, that many of the large schools in England, which are so nobly endowed, but in which the dead languages only are taught, were modelled according to the plan of the Scotch academies and universities. At the time of the foundation of these schools, these languages were deservedly in repute; they were the keys which unlocked the learned lore of antiquity.

AFTER the dark gloom which was spread over Europe by the Goths, and which extinguished every ray of science, had begun to dispel, numbers of the works of the Greeks and Romans were discovered, which were rescued from the general wreck; these were revered, as containing all the knowledge extant. The invention of printing, soon afterwards, spread these treasures of antiquity over the world; and for ages, the philosophy of Aristotle was the standard, from whence there was no appeal: to acquire this knowledge, therefore, it was necessary to learn these languages. But our knowledge on almost every subject, and particularly of the sciences, is now infinitely superior to that of the ancients; and the best of their works have been translated into the modern languages. Hence there is now little necessity for learning the languages of antiquity, which are to be con-

sidered more as ornamental than useful. Is it not therefore better that the abilities of youth should be exercised in gaining a knowledge of things, instead of sounds? Instead of tormenting the young mind during that period when a store of useful knowledge might be laid in, with studying Latin and Greek for seven years, would it not be infinitely to their advantage to instruct them in history, geography, mathematics, mechanics, and other branches of experimental philosophy; particularly chemistry, which is a science of such importance, that there are few situations in life which would not be benefited by a knowledge of it? To the farmer it is as necessary as to the apothecary or the dyer. It is a science by no means difficult to learn, and were the principles of it early instilled into the mind, they would pave the way to discoveries perhaps of greater utility than any that have been yet made. Would it not likewise be of the utmost consequence to those intended for the different mechanic arts, to be instructed in the principles of mechanics? Without these principles, they can never make any material improvements: they may indeed stumble on discoveries, but can never investigate them from true principles.

If languages are to be learned, let them be the modern languages, as French, German, and Italian, in which useful works are written, and business transacted. I would not however discard the ancient languages from the schools, but consider them, as is done at Inverness, and the Scotch universities in general, rather as accessories, than the principal object of education. To

those who exercise the learned professions, they are necessary, because the sciences of law and medicine contain a number of technical terms derived immediately from those languages. Liberal and enlightened men are, however, now employed in stripping from them the scholastic jargon, which has concealed their beauties from the general eye for so many centuries. To the divine, these languages, and particularly the Greek and Hebrew, ought always to be familiar; it being very satisfactory, as well as necessary, to consult the sacred sources of revelation in their purity, unadulterated by the ignorance of translators, or the interpolations of the crafty or bigoted: but if medicine and law were stripped of the terms which now disgrace them, and the student, instead of spending the best of his time in learning the dead languages, should make a proficiency in the modern; and for medicine, particularly, lay a good foundation of mathematics, natural history, and natural philosophy, he would soon acquire a greater and more accurate knowledge of his profession than is generally done. A liberal and enterprising spirit has long shown itself in Inverness; and the good effects of this academy on the next generation will be very evident.

BESIDES this academy, there are several schools and charitable institutions; and a subscription is now carrying on, with great success, for an infirmary, which will be highly useful to the northern counties. I was informed, by an eminent medical gentleman at Inverness, that cancers are very common in this country, particularly among the labouring class of people, which

8. INVERNESS MANUFACTURES.

he attributes to their manner of living, and particularly to the use of whisky. This complaint here chiefly affects the lips, tongue, and nose, and it is certainly possible that it may be owing to the callosity induced by bringing the unadulterated spirit so often in contact with them, which destroys their irritability. Perhaps snuff and tobacco, which are much used in the Highlands, may contribute their share. Whether these complaints are pretty general over the Highlands, or confined to this district, I am unable to say, as I have not met with any Highland practitioners, since I received this intelligence, from whom I could gain information on the subject.

THE principal manufactures in this place are hemp and flax. The first has been established near forty years, and at present employs in spinning, dressing, and weaving, above a thousand men, women, and children. The hemp is imported from the Baltic, and manufactured into sail-cloth and sacking, in which state it is sent to various parts of Britain, and the East and West Indies. The white-thread manufacture has been established near twenty years. This business is said to employ, in all its branches, such as heckling, spinning, twisting, bleaching, and dyeing, no less than ten thousand individuals in the town and surrounding country. The company have in this and the neighbouring counties several agents, who manage the spinning departments. The flax is likewise chiefly imported from the Baltic, and the greatest part of the thread sent to London, from whence it is dispersed to different parts of the world, the Inverness thread being very much esteemed.

THE cotton manufacture has likewise found its way here, and succeeds very well: besides these, there is a considerable manufacture of tanned leather. This place possesses several advantages for manufactures; the raw material is easily imported, and the manufactured goods exported as readily: labour is likewise cheap. The greatest obstacle is the dearness of fuel, coal being imported from England; though it is by no means improbable, from the appearance of the country, that this useful mineral might be found in the neighbourhood, if some of the proprietors would risk a little in making proper trials; or allow these to be made by wealthy and public-spirited individuals.

THE situation of the town is on a plain between the Murray Firth and the River Ness. Ships of four or five hundred tons can ride at anchor within a mile of it; and at spring tides, vessels of half that burden can come up to the quay, close to the town. The greatest number of vessels belonging to Inverness are employed in carrying to London the produce of the manufactures, the fish caught in the river Ness, and the skins of otters, rabbits, hares, foxes, goats, roes, &c. They bring back in return materials both for use and luxury, particularly hardware and haberdashery, for the retailing of which, as well as the wholesale business, there are some excellent shops in Inverness, that supply the very extensive district of which it is the capital.

THE fish caught on the coast are herrings and sprats. The herrings are however much smaller than those caught on the western coast, and are only occasional visitants. In some years there is not the least appearance of them; in others they are more or less plentiful. This fishing is therefore very precarious.

INVERNESS is a royal burgh of great antiquity. Its first charter was granted by king Malcolm Canmore; the last by James VI. The highland dress is very common in this town and neighbourhood, and is undoubtedly much more picturesque and beautiful than the formal, tight, stiff habit of the English and Europeans in general. The highland bonnet is in particular very ornamental; so are the graceful folds of the plaid: the modern habit has, however, convenience to recommend it, and in a few years this ancient dress of the highlanders, which resembles very much that of the ancient Romans, will probably be scarcely seen.

ENGLISH and Gaelic are spoken here promiscuously, though the language of the country people is Gaelic; the English is spoken with very great purity, both with respect to pronunciation and grammar. This may be owing to two causes; in the first place it is not the mother tongue, but is learned by book, as we learn Greek and Latin, and not from common conversation; and secondly, the garrisons of English soldiers which have been in the neighbourhood since the time of Cromwell, have in a great measure regulated the pronunciation; there is likewise compara-

tively little communication betwixt this country and the lowlands, so that the corrupt phrases and pronunciation of the latter are little known.

A FEW years ago were to be seen, on the western extremity of the hill overlooking the town, the ruins of a castle, which was demolished during the rebellion 1745. No vestige of it now remains, the stones having been taken away for building, and the ground cultivated.

THE climate and soil about Inverness are much more favourable to agriculture than those of the western highlands; the crops are at least a month more forward than on the western coast; we saw some barley that was very nearly ripe. Much less rain falls here than on the western coast, of this we were sensible from the appearance of the roads and country; it was likewise confirmed by the observations of several respectable gentlemen with whom we conversed. This is by no means difficult to account for, or different from what we should *à priori* expect. Our rain is generally brought by the west or south-westerly winds, which blow with much greater violence on the western coast; the high mountains arrest the clouds in their flight, and cause them to deposit their contents, which they do in almost constant showers; this, from the coldness occasioned by the evaporation of the fallen rains, as well as from the influence of the sun's rays being diminished by the continual intervention of clouds, is very unfavourable to the ripening of grain,

though it may contribute to the growth of grass. Besides, the force of the west winds seems broken by the ridge of mountains against which they strike, else how can we account for the great difference both in force and frequency of those winds on the eastern and western coasts? The soil on the east coast not being deluged with rain; the action of the sun not being so much diminished by a clouded atmosphere, and the surface of the ground being more flat, are all circumstances that render it much more favourable for the raising of green crops.

CONSIDERABLE quantities of wheat are sown here, which is not the case in the west, or indeed almost any other part of the highlands. At the different inns on the road, we could very seldom procure any other than oat-bread, and if I recollect right, the wheat-bread at Inverness was the first we had tasted since we left Inverary, if we except biscuits at Torloisk. Barley, oats, and peas, are likewise sown here, and potatoes are raised in great abundance, and constitute the principal food of the lower class of inhabitants, for more than three quarters of the year. The disease called the curl, which is so prejudicial to this plant, is unknown here.*

SOME rye is sown, generally mixed with oats, which gives a softness to the oat-bread of this country.

SINCE the introduction of sheep, the small tenantry are gradually wearing away, and the country becomes thinned of popu-

* Stat. Account of Inverness.

lation; but fortunately, those who are thus driven from their farms, find employment in the manufactures of the town, which has increased in population in a greater proportion than the country has diminished.

THE same complaint is here made by the tenants, as in other parts of the Highlands, of the want of leases. Captain Duff, a gentleman of this neighbourhood, has however set an example worthy of the imitation of proprietors, which, if followed, would render their tenants vastly more comfortable, and make it their interest to improve the land, while it would considerably increase the incomes of the landlords. He grants leases to all his tenants, one condition of which is, that each must have a house built according to a certain plan, much more convenient and comfortable than the wretched habitations which I have been so often under the painful necessity of mentioning. If the tenant chooses to build his house himself, his landlord returns the money he has laid out, when he leaves the farm; but if he be not able or willing to undertake it, he must then pay legal interest for the money laid out in building it, which is certainly very reasonable.

WE made what observations we could, and collected all the information we were able, concerning the town of Inverness, in the forenoon of July 29th, and after having taken an early dinner, we went to view the surrounding country. We were particularly struck with a beautiful hill, covered with trees, of a

singular form, resembling a ship with her keel uppermost; this hill, which rises in an abrupt, and as it were insulated manner from the plain, is called *Tom-na-beurich*, or Hill of Fairies. The height of it is about 250 feet above the level of the river; its base is a parallelogram, whose length is 1984 feet, and breadth 176.* From the summit, which is quite flat, is a very fine view of the town of Inverness and the adjacent country. This hill is about half a mile distant from Inverness.

ABOUT a mile farther from the town, is another hill, much higher, rugged and steep, called Craig Phatric. The elevation of its highest part above the bed of the river, is no less than 1150 feet. This hill we ascended by a winding road, which had evidently been formed out of the rock by art, and from the summit had a very fine view of the sea coast, with Fort George standing on a peninsula, and commanding the entrance into the river Ness. This is the last of the chain of forts formerly mentioned, but much larger and more complete than either of the others; it is indeed one of the most complete and regular fortifications in Britain.

THE top of Craig Phatric is flat, and has been surrounded by a wall in the form of a parallelogram, the length of which is about eighty yards, and the breadth thirty, within the wall. The most curious circumstance attending it, is, that the stones are all firmly connected together by a kind of vitrified matter

* Stat. Account.

like lava, or like the slag or scoriae of an iron foundry, and the stones themselves in many places seem to have been softened and vitrified.

THE greatest part of the rampart is now covered with turf, so that it has the appearance of an earthen mound; but on removing the earth, the vitrified matter is every where visible, and would seem to have been in some places of considerable height. On the outside appears to have been a second kind of rampart, but not so regular as the first; considerable masses of vitrified matter are likewise found in this second rampart, under which is the natural rock, chiefly granite, with some breccia or pudding-stone here and there, composed of red granite pebbles, quartz, &c. in a cement of clay and quartose matter.

IN many parts of the wall, the stones are entirely melted, or vitrified; others, on the contrary, in which the fusion has not been so complete, are sunk into the vitrified matter, in such a manner as to be nearly buried in it, or inclosed by it. Within the area is a hollow, which was formerly a well, but has been filled up to prevent sheep falling into it.

THE remains of several vitrified forts like this, are to be met with on the summits of hills in the highlands; the first however who gave any accurate or distinct account of them, was Mr. Williams, mineral engineer. He published "An account of some remarkable ancient ruins, lately discovered in the Highlands and

northern parts of Scotland," in a series of letters. Among these ruins, he describes one on the hill of Knock Farril, on the south side of the valley of Strathpeffer in Ross-shire : one called Castle-Finlay, situated on the north-east, and another named Dun-evan, to the south-west of the Castle of Calder in Nairnshire.

EACH of these vitrified forts is situated on the top of a hill, which is in general small, when compared with the Highland mountains. These hills every where, he observes, overlook and command the view of a beautiful valley, or widely extended level country. They have always a level area on the summit, of greater or less extent, like Craig Phatric ; and this level area has been surrounded by a wall, which, as far as can be judged from the extent of the ruins, has been both high and strong ; these walls are vitrified, or run and compacted together by the force of fire.

THOUGH these fortified hills have a level area on the summit, yet they are always difficult of access, except in one place, which has every where been strengthened by additional works.

SINCE these vitrified forts were described by Mr. Williams, the attention of the curious has been directed to this subject, and several others have been discovered and described by different writers, particularly by Cardonnel and Cordiner : Mr. Lettice

in his Tour, likewise describes one situated on a lofty rock near the sea, on the south-west part of the isle of Bute.

THESE forts appear to be very ancient. Mr. WILLIAMS says, that on making a section through that on Knockfarril, he in some places cut through heath that grew out of peat-moss which was half a foot deep, under which he found the vitrified ruins as strong as any where else. A great part of the ruins of Knockfarril, he observes, is grown over with heath and grass; and the peat-moss must certainly have been formed in the course of a very long time, by the grass and branches of the heath falling off yearly and rotting.

RESPECTING the origin of these forts, there have been a variety of opinions. Some have supposed them to be entirely volcanic; the hill upon which they stand has been thought to have been forced up, into its present conical form, by the force of volcanic fire, which getting vent at the top, has thrown out the lava, or vitrified matter that is found there. In the Philosophical Transactions of the Royal Society of London, for 1777, is "an account of *Greck Faterick*, a volcanic hill near Inverness," in a letter from THOMAS WEST, esquire, to Mr. LAW. In this letter Mr. WEST decidedly pronounces this hill to be an extinguished volcano. He sent a number of specimens of the vitrified matter for the inspection of the society; and we find a note subjoined to the paper by the secretary, signifying that these specimens having been examined by some of the members well

acquainted with volcanic productions, were by them judged to be real lava.

THE bishop of DERRY, when on a tour to the north of Scotland, visited Craig-Phatric, and expressed his opinion that the mounds of vitrified matter are not the remains of any artificial work, but the traces of an ancient volcano.

THE reverend Mr. CORDNER, who has published a description of several parts of the east coast of Scotland, adorned with some beautiful engravings, endeavours to support the idea of these mounds having been the remains of volcanos.

MR. WILLIAMS, however, thinks that they are entirely the production of art; and that the vitrification has been produced by the builders, who were unacquainted with cement, in order to make the forts stronger. He refers them to the times of Fingal, and observes, that the fort on Knockfarril is called by the common people Knock-farril-na-Fion, or Fingal's seat, or resting place on Knockfarril. The mound on Craig-Phatric is likewise called the Giant's Castle, and we know that Fingal and his heroes, from the exaggerated accounts that have been given of them by their bards, are supposed to have been a kind of giants, or men vastly superior to us in valour, strength, and stature.

MR. WILLIAMS supposes that some great fires, which the ancient inhabitants of these countries have used, either in running

bog-ore for their iron utensils, or in offering burnt sacrifices, would give them the first hint that a strong fire would vitrify stones, and connect them together, which hint some genius might improve, and apply to the cementation of forts.

HE supposes that they raised two parallel walls or dykes, of earth or sods, in the direction of their intended wall, leaving a space between them just wide enough for the building; and that these parallel dykes formed the mould or groove in which they were to run their vitrified wall. This groove he imagines they packed full of fuel, on which they laid a proper quantity of the materials to be vitrified. A hot fire, he observes, would undoubtedly melt the stones, especially if they were of the plum-pudding kind, and not too large. The frame of earth would keep the materials, when in fusion, from running without the breadth of their intended wall.

THE foundation being thus laid, he supposes they have added new fires, and more materials, and raised their mould of earth by degrees, till they brought the whole to the intended height, and then have removed the earth from both sides of the vitrified wall. He is confident, from the appearance of the ruins, that the materials were run down by fire in some such manner as has been described. In all the sections of the larger and smaller fragments of the vitrified ruins, he has never seen the least appearance of a stone laid in any particular way. He has never seen a large stone in any fragment of these ruins, nor any stone

or a piece of a stone that was not affected by the fire, and some part of it vitrified.* In this explanation he is joined by Dr. ANDERSON of Monkshill, and Mr. CARDONNEL.

MR. A. FRASER TYTLER, who has given an account of Craig-Phatric, in the second volume of the Edinburgh Philosophical Transactions, agrees with those who think that these vitrified structures are artificial works; but he differs from Mr. WILLIAMS, and others, in the idea that they were vitrified for the purpose of cementing the materials together. His reason for objecting to this is, that the number of forts which show any marks of vitrification, is inconsiderable, when compared with those which do not. He therefore considers the vitrification as accidental, and supposes it to have been produced in the following manner :

IN the rude state in which there is every appearance of their having been formed, it is very probable that buildings both for habitations and defence, would be frequently constructed of loose stones, of an irregular shape, of which, by themselves, it would be scarce possible to fabricate a wall of any tolerable strength. Hence it became necessary to use wood as well as stone in their construction. This kind of building, in his opinion, was begun by raising a double row of palisadoes, or strong stakes, in the form of the intended structure, in the same way as in the ancient mode of building described by Palladio, under the name of

* See Williams's account of some remarkable ancient ruins, p. 47.

reimpuita a cassa, or coffer-work.* These stakes were probably warped across by boughs of trees, laid very closely together, so as to form two fences, running parallel to each other, at the distance of some feet, so close as to confine all the materials of whatever size that were thrown between them. Into this intermediate space, Mr. TYTLER supposes boughs and trunks of trees were thrown with earth and stones of all sizes. Very little care would be necessary in the disposition of these materials, as the outward fence would keep the mould in form. In this way, it is easy to conceive that a very strong bulwark might be reared with great dispatch; which, joined to the natural advantage of a very inaccessible situation, and that improved by artful contrivances for increasing the difficulty of access, would form a structure capable of answering every purpose of security or defence. The most formidable attack against such a building would be by fire, which would, do doubt, be always attempted, and often with success, by an enemy who undertook the siege. If the besiegers prevailed, in gaining an approach to the ramparts, and surrounding the external wall, they would set fire to it in several places; the conflagration must speedily have become universal, and the effect may be easily imagined. If there happened to be any wind at the time to increase the heat, the stony parts would come into fusion; and as the wood burned away, these stones sinking by their own weight into a solid mass, there would remain a wreck of vitrified matter, tracking the spot where the ancient rampart stood; irregular and

* See Pallád. Architect. lib. 1. cap. 9.

of unequal height, from the fortuitous and unequal distribution of the stony materials of which it had been composed.

THIS conjecture seems not improbable, from their appearance at this day ; they do not seem, according to him, to have been much higher than they are at present, though it will be recollected by the reader, that the contrary is asserted by Mr. WILLIAMS. The durable nature of these materials would prevent them from suffering any changes by time ; though from the gradual increase of the soil, they must in some places have lost considerably of their apparent height, and in others have been quite covered.

IN confirmation of this opinion, Mr. TYTLER likewise urges, that in the fortification on Craig-Phatric, a large portion of the outward rampart bears no marks of vitrification. The reason of this seems to be, that the steepness of the hill on that side, rendered a low fence of turf and stones sufficient ; and no wood had probably been employed in its construction. It appears therefore highly probable, says this writer, that the effect of fire upon these hill fortifications has been entirely accidental, or to speak more properly, that fire has been employed, not in the construction, but in the demolition of such buildings ; and for the latter purpose, he observes, it would prove more efficacious than for the former.

WHATEVER side of this dispute we take, we seem to be surrounded with considerable difficulties ; and it is curious enough

to remark, how the same appearances have led different observers to conclusions so very opposite. How, or for what purpose, the vitrification has been produced, I cannot pretend to decide. Craig-Phatric is the only one of these vitrified hills that I have seen ; there are many circumstances which tend to convince an observer, that these works have been artificial, particularly the regular form, which we cannot suppose to have arisen from any volcanic eruption. Besides, there is a road evidently cut with great labour from the level ridge of the rock to the summit, which would otherwise have been inaccessible. At the same time, when the immense quantity of vitrified matter on some of these hills is considered, particularly on the top of Noth, as described by CORDINER, it is not easy to suppose it possible that the art of man could have formed it. That such masses should have been brought into perfect fusion, by the small quantity of fuel which could be put round them in the palisadoes, or mixed with the materials themselves, will not appear very credible, when we consider the extreme difficulty with which stones of any magnitude are brought into complete fusion. On the other hand, though the appearances about BEREGONIUM, mentioned in vol. 1. as well as the basaltic columns of Staffa, and other observations, particularly those which will be afterwards made on the hill of KINNOUL, show that this country has sometimes been the seat of volcanos ; yet this explanation, when applied to these hills, seems to be attended with insurmountable difficulties ; for we shall not, I believe, find examples in any other parts of the world, of volcanos ejecting lava in the form of a parallelogram wall, though the currents do sometimes assume an

appearance of regularity: but here is a mass of vitrified matter in the track of the wall only, and none towards the centre of the flat area, as might be expected. We must therefore I think conclude, that though these appearances are certainly the works of art, yet we are not possessed of sufficient data to decide the question with respect to their construction.

I CANNOT however help thinking with Mr. TYTLER, that these ancient fortifications present a more curious and interesting object of speculation, than those uncertain and fruitless conjectures, as to the mode in which they have been reared.

THEY were undoubtedly built before the use of mortar was known; for as the country abounds with limestone, and the builders would certainly exert all their powers in giving them a proper degree of strength, it would therefore have been used, had they been acquainted with it. Hence we must ascribe to these buildings a considerable degree of antiquity: as the Britons were taught the use of mortar by the Romans, it is probable that we must date their origin before the time of the invasion of that people; so that we may look upon them to be more than 1650 years old; but it does not appear how much beyond that period we should go for their origin. All that can be concluded with certainty is, that they belonged to a period of extreme barbarism. They must have been constructed, as Mr. TYTLER observes, by a people scarcely removed from the state of savages, who lived under no impression of fixed or regulated property in land; whose only appropriated goods were their cattle, and whose sole security,

in a life of constant depredation, was the retreat to the summits of those hills of difficult access, which they had fortified in the best manner they could. Mr. TYTLER indeed supposes, that these forts were constructed not only before the Roman invasion, but even before the introduction of the rites of the Druids into Britain, because it does not appear probable that the inhabitants either lived under such a government as we know to have prevailed under the influence of the Druids, or had any acquaintance with those arts, which it is certain they cultivated.

AFTER having examined with considerable attention the Vitrified Fort on Craig-Phatric, we waited on Provost JOHN MACKINTOSH, who resides during the summer at about two miles distance from Inverness, with whom we spent the remainder of the day. After tea, he accompanied us to the plain of Culoden, about a mile distant from his house, and three miles from Inverness, memorable for the total defeat of the Rebels on the 16th of April, 1746, by the king's troops under the duke of CUMBERLAND, which put an end to the wild and ambitious projects of the Stuart family.

NEAR this Moor is Culoden House, the residence of the ancient family of FORBES. It was here that the young Adventurer lodged on the evening preceding the engagement, which put a period to his hopes. For some time before, dissensions had broke out in his army, which was totally insubordinate to discipline; private quarrels had distracted his officers, and these

circumstances, together with his want of success, had filled his mind with despair : he seemed as if he had lost all power of acting, and could scarcely be prevailed upon to mount his horse on the morning of the fatal day.

THE royal army began their march from Nairn, in five columns, of three battalions each, led by Major-general Huske on the left, lord Sempill on the right, and brigadier Mordaunt in the centre, flanked by the horse under generals Hawley and Bland, who likewise covered the cannon on the right and left. In this order they marched about eight miles, when a detachment of Kingston's horse, and of the highlanders, having advanced before the rest of the army, discovered the van of the Rebels drawn up on Culloden Moor. The royal army immediately formed ; the number was 8,811, that of the rebels 8,350, so that there was no great inequality, and it is generally thought that the rebels might have made a better stand, had they been well affected to their Chief, and to each other. They had some four-pounders, with which, from behind a park wall on the right, they began about two o'clock to cannonade the duke's army ; but their artillery, if it deserved that name, was so very insignificant and ill-served, that it did little execution, while the fire from their enemies was severely felt, and occasioned great disorder. Impatient of this fire, their front line advanced to the attack, and about 500 of the clans charged the duke's right wing with their usual impetuosity. One regiment was disordered by the weight of this column ; but two battalions advancing from

the second line, soon stopped their career ; finding themselves thus disappointed, they turned their whole force on the left, endeavouring to flank the front line. This design was also defeated, by the advancing of Wolfe's regiment, while in the mean time the cannon kept playing on them with cartridge shot. General Hawley, assisted by some highlanders, had opened a passage through the park wall on the right, through which the horse on the left of the royal army advanced ; while the horse on the right turning the opposite way, dispersed the Pretender's corps of reserve, and met those who had come through the wall in the centre ; these jointly attacked the front line of the rebels in the rear, which, being repulsed in front, fell into great confusion. A dreadful carnage was made by the cavalry on their backs ; notwithstanding which, some part of the foot still preserved their ground ; but Kingston's horse, from the reserve, galloping up briskly, and charging them, did terrible execution. In a very short time they were totally defeated, and the field covered with the slain. Of the rebels about 2,500 were killed, wounded, and taken prisoners, while the royal army only lost about 200 men.

DURING the engagement, the French piquets, who were stationed on the right, did not fire a single shot, but stood perfectly inactive, and afterwards surrendered themselves prisoners of war. An entire body of the clans marched off the field in order, at the beginning, with their pipes playing.

THE barges of the English attended near the shore for the safety of the duke's person, in case of a defeat; but when he perceived them, he immediately ordered them to a distance, to convince his men that he was resolved either to conquer or perish with them; it had however been agreed between the persons in the ships and the troops, that if the latter were victorious, they should set fire to a house, which they did, and several persons, men, women, and children, escaped the flames with great difficulty.

THE highlanders were buried by their friends the next day, who dug holes for them on the moor. Among the heath we were shown several green elevated spots which contained their remains, and one larger than the rest, where no less than fifty were interred together. In one which had been opened a few days before, we saw several human bones. The country people often find small cannon- and musquet-balls, which they sell to the curious who come to take a view of this field of battle.

THE young Pretender had his horse shot under him during the engagement, and after the battle fled with great precipitation and alone, to the house of a factor of lord LOVAT, about ten miles from Inverness, where he staid that night, and was joined by a few followers; next day he went to fort Augustus. Finding himself pursued, he took to the mountains, and for several days wandered about the country. Sometimes unattended he found refuge in caves and cottages; sometimes he lay in

forests, with one or two companions of his distress, constantly pursued by the troops of the conqueror, who had offered a reward of thirty thousand pounds for taking him dead or alive. He had occasion, in the course of his concealments, to trust his life to above fifty individuals, whose sense of honour and veneration for his family outweighed their avarice.

A PERSON of the name of MAC-IAN, to whose cottage he went, and on whose protection he threw himself, though no friend to his cause, watched over him with inviolable fidelity for weeks, and even robbed, at the risque of his life, for his support, at the very time that he and his family were in a state of starvation, and when he knew he could gain an immense sum by betraying his guest. This poor man was afterwards executed for stealing a cow, in a very severe season, to keep his family from starving. A little before his execution, he took off his bonnet, and thanked God that he had never betrayed a trust, never injured the poor, and never refused a share of what he had to the stranger and needy. This man certainly deserved a better fate, and the King was said to have declared, that had he known the circumstance in proper time, he would have put him in a situation in which he would not have been tempted to steal a cow for his subsistence.*

ONE day after the unfortunate Adventurer had walked from morning till night, without tasting food, he ventured to enter a

* Stat. Account of Glenorchy.

house, the owner of which he knew was attached to the opposite party. As he entered, he addressed the master of the house in the following manner: "The son of your king comes to beg a little bread and a few clothes; I know your present attachment to my adversaries, but I believe you have sufficient honour not to abuse my confidence, or to take advantage of my distressed situation. Take these rags that have for some time been my only covering; you may probably restore them to me one day when I shall be seated on the throne of my ancestors." The master of the house was touched with pity at his distress; he assisted him as far as he was able, and never divulged the secret.*

For six whole months did this unfortunate man wander among the wilds of Glengary, often closely hemmed in by his pursuers, but still rescued, as if providentially, from the impending danger. At last a privateer from St. Maloes, hired by his adherents, arrived in Lochrannach, in which he embarked in a most wretched attire, having never changed his linen for several weeks. They set sail for France, and after having been chased by two English men of war, they arrived in safety on the coast of Bretagne.

THE behaviour of the soldiers, after the victory at Culloden, will always be a stain both upon the army and their commander; they refused quarter to the wounded, unarmed, and defenceless;

* Goldsmith.

many were slain who had only been spectators of the combat, and the soldiers were seen to anticipate the executioner.

It is generally supposed that this battle was fought contrary to the advice of some of the most sensible men in the rebel army, who wished the Pretender to retire to some fortresses on the north of the Ness, where they might defend themselves among the mountains; they represented that England was engaged in bloody wars, foreign and domestic; that it could then but ill spare its troops; and that from these and other considerations, the government might be induced to grant to the insurgents their lives and fortunes, on condition of laying down their arms; this rational plan was however superseded by the favourite faction in the army, to whose guidance the unfortunate and infatuated Adventurer had resigned himself.

JULY 30th. Having breakfasted very early, we took the road to Dunkeld, generally called the highland road; the first stage, which was fifteen miles, was very dreary, nothing but shapeless hills covered with heath being visible, till we came to the 12th mile-stone, when we perceived on our left a small lake called Loch Moy, whose banks were beautifully wooded. The length of this lake is near two miles, and its breadth about three quarters of a mile. It abounds with char and trout.

NEAR the middle of this lake is an island, containing about two acres of ground, at the south end of which are the remains

of a house, which has been a place of strength in turbulent times. It appears, from an inscription over the gate, to have been built in the year 1665, by LAUCHLAN, the twentieth laird of Mackintosh. Adjoining this house was a garden, which still contains some fruit trees. From the ruins yet remaining, it would appear that there have been formerly very extensive buildings on this island: the remains of a street, running the whole length of the island, with the foundations of houses on each side, are still very visible; and in the year 1760, two ovens were discovered, each capable of containing four bushels of meal made into bread.*

IN 1422, this place contained a garrison of four hundred men. At the distance of about two hundred yards from this, is an artificial island, which has been formed by heaping a parcel of large round stones upon each other. This was used as a place of confinement for malefactors, before the abolition of the judicial power of the chiefs. It is so very little raised, that when the lake was low the criminal could just stand with dry feet; but after rains, the water rose to his middle. This place is still called *Ellan-na-glach*, or the stony island.

THIS lake, and the neighbouring country, is the property of the chief or captain of the clan MACKINTOSH, who used to reside on the island; the present laird has a good house, pleasantly situated, at the head of the lake. This estate came into the pos-

* Stat. Account of Moy.

session of William, the seventh laird of Mackintosh, in the year 1336, being conveyed to him by David, bishop of Murray. The clan CHATTAN, or MACKINTOSH, is a very ancient and powerful clan, consisting originally of sixteen tribes, each having their own chieftain; but all voluntarily united under the government of one leader, of whom the present laird of Mackintosh is the representative.

HERE is preserved the sword of JAMES V. given by that monarch to the captain of clan CHATTAN, with the privilege of bearing the king's sword; on the blade is the word JESUS. It was consecrated, and sent to James, by pope LEO X.

THE parish church of Moy stood formerly on the island, but is now removed to the western bank of the lake, as well as the manse, or minister's house.

THAT in turbulent times the powerful chief of Mackintosh was not inactive, or more disposed to peace than his neighbours, will appear from the following account of the conflict of *Clagbna-berey*, related in the history of the feuds and conflicts of the clans, a work which has been before noticed. As the account is not very long, I shall transcribe it literally.

“ ABOUT the year of God 1341, JOHN MONRO, tutor of Foullis, travelling homeward on his journey from the south of Scotland, towards Ross, did repose himself by the way, in Strathar-

dale, betwixt Saint Johnstoun and Athole, where he fell at variance with the inhabitants of that country, who abused him; which he determined to revenge afterward. Being come to Ross, he gathered together his whole kinsmen, neighbours, and followers, and declared unto them how he had been used, and craves their aid to revenge himself; whereunto they yield. Thereupon he singled out 350 of the strongest and ablest men amongst them, and so went to Strathardale, which he wasted and spoiled; killed some of the people, and carried away their cattle. In his return home (as he was passing by the isle of Moy with his prey, Mackintosh, chieftain of the clan Chattane, sent to him to crave a part of the spoil, challenging the same as due to him by custom: John Monro offered Mackintosh a reasonable portion, which he refused to accept, and would have no less than the half of the whole spoil, whereunto John would not yield. So Mackintosh convening his forces with all diligence, he followed John Monro, and overtook him at Clagh-na-heresy, beside Kessack, within one mile of Inverness. John, perceiving them coming, sent 50 of his men to Ferren-donnell with the spoil, and encouraged the rest of his men to fight. So there ensued a cruel conflict, where Mackintosh was slain, with most part of his company. Divers of the Monroes were also killed, and John Monro left as dead on the field; but after all was appeased, he was taken up by some of the people thereabout, who carried him to their houses, where he recovered of his wounds; and was afterwards called John Back-lawighe, because he was mutilate of an hand."

AT the end of the stage we came to a wretched-looking mud hut, and were shown into an apartment perfectly corresponding to the external appearance, where the wind whistled through the broken panes. Here we dined, and found our fare much better than we expected. While dinner was preparing, we amused ourselves with angling in the river Findhorn, which runs close to the inn. This hut is called the Freeburn Inn, and is kept by Alexander Macpherson, as we were informed by a large sign-board, which must have cost nearly as much as the house, if not more*. A small rivulet called Freeburn falls into the Findhorn at this place, whence the name of the inn.

MR. WATTS had the fortune to catch some trout, but I had bad luck, owing I believe to my attending more to the pebbles that formed the bed of the river, than to the flies. I was not however without my reward, for I found a most beautiful kidney-shaped pebble of fine talc, near two pounds in weight. From the appearance of this pebble, it must have come from a bed of talc probably of considerable size, equal in purity to that from Muscovy. It would not perhaps be difficult to find this bed, by examining carefully both banks of the river, and likewise the banks of the different rivulets which fall into it, from Freeburn upwards.

* I have lately seen proposals for building a commodious Inn here by subscription. Mr. MACKINTOSH, the proprietor, is to advance two hundred pounds, and three hundred are to be raised by the gentlemen in the country.

THE river Findhorn takes its rise from a few inconsiderable springs at no great distance, the principal one of which issues from a fissure in a large rock. The whole course of this river, from its source to where it falls into the Murray Firth, is about fifty miles. It is called, in English, *Findhorn*, but the Gaelic name is *Uisg-earn*. As the river runs during the greatest part of its course between very high mountains, which pour into it a great many torrents, it rises very rapidly, and falls as suddenly.

AFTER dinner we pursued our course to Avimore, fifteen miles further, where we slept. The house and accommodations were very good. The first half of our afternoon's ride was extremely barren and dreary: On our road we overtook several groups of women, with some children and a few men. They informed us that they came from the county of Sutherland, and were travelling to the south country to assist in the harvest, an annual custom with many of these people. Each of them had a bundle on the back, containing a few articles of clothing, and a bag of oatmeal, on which they chiefly subsist during their journey, lodging at nights in barns.

THE greatest part of the ground on the road side, and probably to a considerable extent, was in a manner covered with the *Arbutus-uva-ursi*, and the *Juniperus communis* grows in great plenty in some places. About the distance of ten miles from Freeburn, we entered some very extensive natural pine forests, under which grew great quantities of the *Vaccinium myrtillus*,

the berries of which were then ripe, and tempted us to stop some time to gather them. The pine forest was succeeded by woods of weeping birch, which made this part of the road very pleasant. About three miles before the end of our journey, the country assumed a very different aspect, and the lumpish hills were exchanged for very picturesque mountains. At a small distance from the inn at Avimore is a Druidical Temple very entire.

THE greatest part of this day's ride, it must be confessed, was however dreary, but was enlivened by the mile-stones on the road; objects which we had not seen, I think, since we left Arroquhar, or at furthest Inverary, and which afforded us much more satisfactory information than the rude conjectures of the peasants whom we met. It frequently happened that when we asked any person how far it was to the next stage; if they could speak any English, after some consideration, they would tell us perhaps six miles; after riding a mile or two further, if we asked another person, he would say six, or perhaps seven miles; so that, in several instances, the nearer we approached to the end of our journey, the further, according to these accounts, we were from it. With the idea of facilitating our communication with the highlanders, Mr. Watts had, before we set out, employed himself in learning Gaelic; but instead of being useful, my friend's knowledge of this language seemed to perplex us, for though he could ask several necessary questions, yet he could scarcely comprehend their answers; and when they had heard him once

speaking Gaelic, we could scarcely ever prevail on any of the persons whom we met to speak any English, so that we literally experienced the truth of the adage,

A little learning is a dangerous thing.

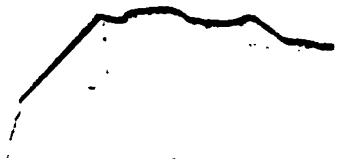
AVIMORE is situated in a narrow valley, or strath, called *Strath-spey*, from its being intersected by the river Spey. From the windows of our inn we saw, at a considerable distance, a high mountain, near the top of which were several large patches of snow. This mountain was *Cairn-gorm*, or the blue mountain, and is one of the highest of the Grampians, its summit being 4,050 feet above the level of the sea.* This mountain is celebrated for its beautiful rock crystals of various tints, which are much esteemed by the lapidaries. Many of them have the lustre of fine gems, and bring very high prices. They are known by the name of *Cairn-gorm* crystals; a name, however, which is in Scotland given to similar crystals, though found in other situations.

JULY 31. Leaving Avimore, we entered a wood of birch, which was succeeded by a forest of oak, and afterwards passed through a pleasant fertile country. After travelling about seven miles, we saw a lake on our left, about a mile long and half a mile broad: the name of it, we were told, was Loch Alvie. It empties itself into the Spey, and abounds with very fine white and red trout, generally about a pound in weight, though some

* Stat. Account of Kirkmichael.

are found which weigh four or five pounds. Though this lake has a communication with the Spey, it has been supposed that its fish seldom visit that river, as they are much finer than those found in the Spey. At no great distance from the lake is the burial place of the chief of the MACPHERSONS. The district in which we now were, is called Badenoch, and this part of it is the country of the Macphersons. A little further we passed Belville, a large modern house, situated on an eminence on our right, the property of Mr. Macpherson. Here the river Spey runs for several miles through the middle of a fertile flat valley, which has evidently been a lake: the waters of this river have undoubtedly, at a former period, covered this verdant flat, being then confined by a barrier, or natural dam, a little below Pitmain, which has evidently been worn away, and thus the water has subsided, and the river contracting itself into a narrower compass, now meanders through the vale it once covered. Instances of this kind are common in almost all mountainous countries. A river often winds through a perfectly flat plane, which, when covered with snow, may easily be mistaken for the frozen surface of a lake. Instances of this may be seen in various parts of the highlands, and in the neighbourhood of Moffat, which will be more particularly noticed in their proper place.

ON the opposite side of the Spey, upon a mound apparently artificial, stand the ruins of a fortress called Castle Rivin.



THE name of the inn where we stopped is Pitmain, thirteen miles distant from Avimore. It is a very good house, and adjoining to it is a better garden than I ever saw belonging to an inn, if we except some of the public gardens near London. It contained abundance of fruit, of which we were invited to partake by our landlord, a good-natured man, and very fond of boasting of his intimacy with the nobility.

ABOUT two miles from Pitmain, and within a few yards of the high road, is an artificial cave, about sixty feet long, nine broad, and seven high, the sides of which are built with stones; it is covered with large flags or flat stones, over which a house was built. The entry into this cave is said to have been from the centre of the house, by raising one of the flags of the floor. From this circumstance, it appears formerly to have been the retreat of banditti.

AFTER having dined at Pitmain, and listened for an hour to the conversation of our landlord, who came to drink a glass of punch with us, we set off for Dalwhinnie, distant likewise thirteen miles. The ride was exceedingly bleak and dreary. About two miles from Pitmain we crossed the Spey, and kept near it for some time. In the whole of this day's ride we saw plenty of the *Arbutus-uva-ursi*, and a great deal of the *Alchimilla alpina*. The inn at Dalwhinnie, where we slept, was by no means uncomfortable.

AUGUST 1st. From Dalwhinnie we came to Dalnacardoch,* another stage of thirteen miles. Our ride was among barren mountains, but generally by the side of a river; soon after we lost sight of one, we met with another. About six miles from Dalwhinnie we came to a lake into which two rivers emptied themselves; more than half of it, on that part where the smaller river enters, was filling up; it was yet too soft to bear a considerable weight, but was covered with a beautiful green turf, through which the river bent its serpentine course.†

* *Dail-na-cardoch*, signifies the dale of the smith's shop, or rather of the iron work. In many parts between this place and Blair, are to be seen holes in which iron was smelted by means of wood.

† The idea that many lakes have disappeared, has been repeatedly mentioned, and when we take an accurate survey of several extensive plains or valleys, in mountainous countries, we shall find abundant reason to believe that these collections of water were formerly much more numerous than at present; and that many of the fertile plains we meet with have been the bottoms of lakes. Mr. GOUGH of Kendal has considered this curious subject with much attention, and has communicated his ideas in an excellent paper, printed in the fourth volume of the Memoirs of the Literary and Philosophical Society of Manchester, to which the reader is referred. He points out two ways in which a lake may have disappeared. The first is by its bed being filled up with vegetable matter growing within it, which will gradually exclude the water, and in this way he accounts for the flat marshes, or peat bogs that supply many countries in the north of Europe with fuel; great numbers of these are to be met with in many parts of the highlands, and in Ireland, which are as exactly level as a piece of water.

THE second way in which lakes have disappeared, has been from the outlet being gradually corroded, or worn by the force of the stream; hence the water will gradually subside, the inequalities of the basin will appear above the surface in the form of islands; and whenever the situation of the discharging river would permit its bed to be worn to the level of the lowest part of the reservoir, the lake has disappeared, and we find a valley in its room. It is easy to perceive whether the water of a lake has disappeared from its having been filled up with vegetables, or emptied by the wearing down of its lowest bank. In the first place, a bog or moss is formed, as level as water, and in the second, a hollow basin, the soil of which lies on a pebbly bottom.

THE inn at Dalnacardoch is a very good one; both this house and that at Dalwhinnie were built by Government, with part of the money arising from the forfeited estates. In the front is a stone, with the following inscription :

Hospitium hoc
In Publicum commodum
GEORGIUS III. REX
Construi insistit.

A. D. 1774.

Rest a little while.

Galehaif fois cal tamvill bhig.

FROM Dalnacardoch we proceeded to Blair-Athol, distant ten miles and a half; the first half of our ride was by no means interesting, being among lumpish hills covered with heath; but when we arrived within about five miles of Blair, the country began to assume more the appearance of cultivation, and we discerned the extensive grounds of the Duke of Athol, covered with wood. About three miles and a half before we reached Blair we passed the small village *Bruir*, which takes its name from a turbulent stream, called Bruir-water, that rolls along its rocky bed under a bridge.

WE went up the left bank of this river, whose channel is the most rugged that can be conceived; the rocks which form it have been worn into the most grotesque shapes by the fury of the water. A foot-path has lately been made by the Duke of

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Lower Fall of Brunic

Athol, which conducts the stranger in safety along the side of the chasm, where he has an opportunity of seeing, in a very short time, several very fine cascades; one over which a bridge is thrown, forms a very picturesque object. This is called the lower fall of Bruir.

THE water here rushes under the bridge, and falls in a full broad sheet over the rocky steep, and descends impetuously through a natural arch, into a dark black pool, as if to take breath, before it resumes its course, and rushes down to the Garry.

PROCEEDING up the same side of the river, along the footpath, we came in sight of another rustic bridge, and a noble cascade, consisting of three falls or breaks, one immediately above another; but the lowest is equal in height to both the others taken together. Each of the higher breaks is about fifty feet, the lowest a hundred, so that the whole cascade is not less than two hundred feet. This is called the upper fall of Bruir. Crossing the bridge over this tremendous cataract, with trembling steps, we walked down the other bank of the river, to a point from whence we enjoyed the view of this fine fall to great advantage. The shelving rocks on each side of the bridge, with the water precipitating itself from rock to rock, and at last shooting headlong, filling with its spray the deep chasm, form a scene truly sublime; the nakedness of the hills indeed takes away somewhat from its picturesque beauty. The poet BURNS,

when he visited these falls, wrote a beautiful poetical petition from Bruir-water to the Duke of Athol, praying him to ornament its banks with wood and shade; the noble proprietor has been pleased to grant the prayer of the petitioner, and has lately planted the banks of this river: the plantation is yet very young, but in a few years will have a very good effect.

No person from the southern parts of the country, coming to Blair, should omit seeing the falls of Bruir. It must be confessed that we saw them to great advantage, on account of the rain which had fallen during the two or three preceding days; the grandeur of the scene may perhaps be diminished after a long fit of dry weather. Such a drought does not however often occur in this part of the country.

HAVING satisfied our curiosity, or rather staid as long as our time would permit, for we could have contemplated these scenes four hours, we proceeded to Blair, a poor village, with a mean-looking church, resembling an English barn. The only objects meriting the attention of the stranger, are Blair Castle, or Athol House, a seat of the Duke of Athol, and the surrounding pleasure grounds. The house stands on an extensive plain,* sur-

* The reader will undoubtedly have observed that the ancient Celtic names of places and things, are generally short descriptions of them, like the new chemical nomenclature, or else originate from some remarkable circumstance or transaction. This gives to the Gaelic a particularly expressive energy. *Blair* properly signifies a plain clear of woods; *Athol* is a corruption of *Adh-oll*. *Adh* signifies happiness or pleasure, and *oll* signifies great; so that *Blair-Adh-oll*, the name of the fine valley extending from this place to Dunkeld, probably means the great pleasant plain, which is very descriptive of it.

Upper Fall of Brim



Engraved by W. H. Green.

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rounded by mountains ; it was formerly a lofty edifice, as well as a place of great strength ; and being the only fortress of consequence in these parts, was considered of great importance, and had its share in every disturbance of the times. In the year 1644, the garrison ventured to check the career of the celebrated Marquis of Montrose, but he besieged it, and took it by assault ; after which he was joined by a considerable body of the Athol vassals, to whose bravery he was indebted for the victory he obtained at Tibbirmoor. About ten years after, it was taken by storm by Colonel DANIEL, an officer in CROMWELL'S army. In 1689, it occasioned, as Mr. PENNANT observes, one of the greatest events of the time, being the cause that brought on the celebrated battle of Killicranky, which will be afterwards more particularly noticed. In the year 1746, it was gallantly defended by Sir ANDREW AGNEW against the rebels, who attacked it twice without success ; after the second attack, they retired northward, a few weeks preceding the decisive battle of Culloden.

THE late Duke of Athol, perceiving the seat of his ancestors, and his own favourite residence, continually subject to insults and disturbance on account of its strength, took down its towers, and three of its stories, that it might never again be an object to be garrisoned ; this dismantlement has been no improvement to its picturesque appearance : with the materials taken down, a long range of offices has been built on each side of it.

THE house at present contains some large and well-furnished apartments, but nothing which can particularly attract the attention of the stranger. From the house we entered, by a little wicket, the flower garden, a pleasant little wilderness, through which a rivulet winds; here are some statues, which it must be confessed are not any acquisition to the scene; among the rest, is a fowler levelling his piece directly at you as you proceed. Following the serpentine walk, which conducted us under a bridge, we entered a deep glen or linn, thickly covered with wood, and along whose sides the walk is carried about a mile, it then goes over the stream by means of a rustic bridge, and is continued down the other side of the glen. In different parts of this walk are placed little rustic temples, and seats; the brook dashing over the rude rocks, forms some pretty cascades. This walk finished the business of the day.

AUGUST 2d. We visited the Duke's gardens, which are not very interesting; at one end are a number of leaden statues, representing Harlequin, Columbine, and the rest of the *dramatis personæ*, with some rustic figures. The Duke has been very successful in the cultivation of rhubarb (*Rheum palmatum*), which grows here in as great luxuriance as in any part of the world. The quantities raised have not been exceeded in Britain, and evidently show, that with a very little attention, we need have no recourse to Turkey or India for this drug.

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York Cascade

LEAVING the garden, we were conducted along the banks of the Tilt, which runs furiously along its rocky channel; and saw several cascades falling into it from the neighbouring hills. One in particular attracts the attention by the beauty of its woody scenery, and its broken or interrupted falls. This is called the York cascade, in compliment to DRUMMOND, the late archbishop of York. An elegant Chinese bridge is thrown over it, an ornament which some will think out of its place. From a rustic grotto, well suited to the scenery, at a small distance from the York cascade, is a view of another fall, precipitating itself into the Tilt.

THE York cascade, considered as an ornament to pleasure grounds, is undoubtedly beautiful, but it wants sublimity and simplicity. I agree in opinion likewise with Mr. GILPIN, whose taste for the picturesque can seldom be called in question, that the very circumstance of these cascades falling into a river immediately under the eye, detracts from their importance; it makes them appear smaller, by bringing them into comparison with a greater stream. I am convinced that the fall of Foyers, which must strike every observer as a grand object, would lose much of its sublimity could it be seen to fall into Loch Ness; it would then be a drop of water poured into the ocean.

FROM Blair we proceeded along the banks of the Garry, the largest stream in this neighbourhood, and which receives the water of the Tilt, and many other rivulets. These banks are

highly picturesque and beautiful, being thickly covered with fine trees, which now and then afford a sight of the river, and of the hills that seem to close on every side, as if to prevent our proceeding further.

AT the distance of about three miles from Blair, we came to a plain of no very great extent, bounded on all sides by high mountains. This was the plain of Killicranky. On an eminence on the left, overlooking this plain, is Urrard, the residence of a Mr. STEWART. At the first view one would think it almost impossible to get out of this valley, it being blocked up, on every side, by steep hills, finely covered with wood; a winding road may however be perceived on the side of one of the hills, which affords the only exit or entrance. This is the celebrated pass of Killicranky,* which strongly marks the entrance into the highlands, as well as the difference in the appearance of the two countries situated to the northward and southward of it. There are two remarkable passes of this kind, as has been formerly noticed; Killicranky on the east, and Glencoe on the west: to the north of these, the chains of stupendous mountains which compose this romantic country begin; so that they may

* According to the reverend J. M'LOGAN, minister of Blair, a gentleman well versed in Celtic literature, Killicranky is a corruption of *Coille-croithnuich*, or the wood of trembling, from its awful appearance. (Stat. Account.) Some of my readers may think that I have introduced too much of the Celtic etymology in this work, but I am clearly of opinion, with Mr. M'Logan, that it is necessary to ascertain these derivations now, as the country *senachies*, or historians, who can best account for these things, are becoming less numerous, and the next generation will perhaps present few who will trouble themselves about Celtic etymology.

be looked upon as the natural boundaries between the highlands and lowlands. The country, however, takes the name of Highlands as far as Dunkeld on this side of the island, and Loch Lomond on the west, because Gaelic is the common language of both these places.

IN a military light, the pass of Killicranky has always been considered as a very formidable defile, and may with propriety be termed the Caledonian Thermopyle. It may be defended by a small body of men against almost any number, because few of the most numerous army could come into action. In the last rebellion, a body of Hessians having been detached into these parts of Scotland, made a full pause at this streight, and refused to march further; it seemed to them the *ne plus ultra* of habitable country*.

It was in the reign of king WILLIAM that the celebrated battle to which I before alluded, was fought on the plain of Killicranky. The only spirited attempt made in this reign in favour of the exiled family of Stewart, was that by Viscount DUNDEE, in whom all the hopes of JAMES and his party were now centred. This nobleman, who had assembled a considerable number of highlanders, resolved to attack General MACKAY, on an assurance he had received by message, that the regiment of Scottish dragoons would desert that officer, and join him in the action. Mackay having received intimation of this design,

* Gilpin.

began, is called Mount Clavers; a number of human bones have been found in it in digging for gravel. The skeleton of a man was found in a garret at Urrard, some years after the battle, supposed to have been the bones of a soldier who had taken refuge there*.

ON leaving the pass of Killicranky, we perceived on our right, directly below us, a bridge over the Garry; over this we went to see the Fall of the Tummel, which is about a mile and half distant from hence. As we approached this river, accompanied by a gardener who lives in a cottage on the western bank of the Garry, we found the scenery exceedingly wild and picturesque. The grounds belong to Dr. STEWART of Perth, but Sir JAMES PULTENEY has obtained a lease of them, and intends to build a house, and ornament the grounds; which may certainly be rendered equal to any in Britain, if the improvements are made with taste, for here is capability for every thing. The irregular and varied surface of the ground covered with weeping birch; the Tummel rolling furiously along, and forming a fine cascade, together with the wild mountain scenery, constitute all that a landscape gardener could desire, and which the hand of a BROWN or a REPTON would have quickly transformed into a paradise.

THE Fall of the Tummel, though by no means so high as those of Bruir and Foyers, is nevertheless equally grand, if not

* Stat. Account of Moulin.

Staff of the Admiralty.



Drawn by H. P. H. H.

Engraved by W. G. G.

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more so, on account of the much greater quantity of water that falls. It precipitates itself over the broken rocks with a fury and noise that astonishes and almost terrifies the spectator. The accompanying scenery is particularly fine; rugged rocks wooded almost to the summit, but rearing their bald heads to the clouds, with distant mountains of the most picturesque forms, compose a view in which every thing that a painter can desire is contained.

It has been disputed, whether in the quantity of water, the Falls of the Tummel, or those of the Clyde, claim the pre-eminence. As far as the distance of a few weeks, which elapsed between seeing them both, will allow me to form a comparison, I should yield the palm to the Tummel, though the Falls of the Clyde are undoubtedly higher.

GREAT quantities of salmon were formerly caught here in wicker baskets, by men who hung on the face of the slippery rock, in ropes made of birch twigs. To the north-west of the Fall is a cave in the face of a tremendous rock, to which there is only one passage, and that very difficult. In this cave a party of the M'Gregors are said to have been surprised during their proscription; after part of them were killed, the rest climbed up a tree that grew out of the face of the rock; upon which their pursuers cut down the tree, and precipitated them to the bottom.

A LITTLE below the Falls, the Tummel mixes its waters with the Garry. Near this junction is Faskally, the seat of Mr. ROBERTSON, delightfully situated. After the Tummel unites with the Garry, its character seems entirely changed; before this, it was a furious and impetuous torrent, tearing up every thing in its way, and precipitating itself headlong from rock to rock, as if regardless of the consequences; it now becomes a sober and stately stream, rolling along its waters with majesty.

THE banks of the Tummel, along which we rode, are extremely rich, and the river meanders through a fine valley; now dividing its streams, and forming little islands; now running in a fine broad sheet. Though the Tummel is smaller than the Garry, yet it gives its name to the river formed by their union, because it can trace its origin farther back than the Garry, which is an upstart stream, formed of the waters of the neighbouring hills; while the source of the Tummel is a considerable lake, in its course from which several distant streams contribute to swell its pedigree. It may indeed be observed, that rivers in their origin and progress, and even in the features of their character, bear no inconsiderable resemblance to the life of man; this similarity is beautifully traced by the celebrated natural historian Pliny.

"THE river," says he, "springs from the earth, but its origin is in heaven. Its beginnings are insignificant, and its infancy frivolous; it plays along the flowers of a meadow; it waters a garden;

or turns a little mill. Gathering strength in its youth, it becomes wild and impetuous; impatient of the restraints which it still meets with among its native mountains, it is restless and fretful; quick in its turnings, and unsteady in its course. Now it is a roaring cataract, tearing up and overturning whatever opposes its progress, and shooting, as if desperate, headlong down a rock. It then becomes a sullen and gloomy pool, buried at the bottom of a glen. Recovering breath by repose, it again dashes along, till tired of the uproar and mischief, it quits all that it has swept along, and leaves the opening of the valley strewn with rejected waste. Now quitting its retirement, it comes abroad into the world, journeying with more prudence and discretion, through cultivated fields; yielding to circumstances, and winding round what would trouble it to overwhelm and remove. It passes through populous cities, and all the busy haunts of men, tendering its services on every side, and becomes the support and ornament of the country. Now increased by numerous alliances, and advanced in its course of existence, it becomes grave and stately in its motions, loves peace and quiet; and, perfectly undisturbed by those rains and storms which formerly swelled it into torrents, in majestic silence it rolls on its mighty waves, till it be laid at rest in the vast abyss."

THE property of the Duke of ATHOL in this district is very extensive, and his influence in proportion. Before the abolition of vassalage, he could with ease bring two or three thousand men to the field, still leaving a sufficient number to cultivate the

ground. In the extensive forests are great numbers of roebucks, and red deer, which used formerly to be hunted with all the parade of an eastern monarch. The present Duke frequently amuses himself for weeks together with hunting the red deer; a diversion which he pursues with ardour; not indeed attended by hundreds and thousands of followers, but by six or seven active men, all clad in the highland dress, which he himself wears on such occasions.

As a specimen of the magnificent style in which these chieftains formerly lived, I shall transcribe the account of a hunt given by the Earl of Athol, near Blair, for the amusement of JAMES V. from Sir DAVID LINDSAY'S history.

“THE Earl of Athol, hearing of the King's coming, made great provision for him in all things pertaining to a prince, so that he was as well served and eased, with all things necessary to his estate, as he had been in his own palace of Edinburgh. For I heard say, this noble Earl gart make a curious palace to the king, his mother, and to the ambassador, where they were so honourably eased and lodged as they had been in England, France, Italy, or Spain, concerning the time and equivalent, for their hunting and pastime; which was builded in the midst of a fair meadow, a fair palace of green timber, wind with green birks, that were green both under and above, which was fashioned in four quarters, and in every quarter and nuik thereof a great round, as it had been a block-house, which was lofted and gested

the space of three house height; the floors laid with green scarets, medwart, and flowers, that no man knew whereon he zeid, but as he had been in a garden. Further, there were two great rounds in ilk side of the gate, and a great portcullis of tree, falling down with the manner of a barrace, with a draw-bridge, and a great stank of water, sixteen foot deep, and thirty foot of breadth. And also this palace within was hung with fine tapestry, and arrasses of silk, and lighted with fine glass windows, in all airths; that this palace was pleasantly decored, with all necessities pertaining to a prince, as it had been his own palace royal at home. Further, this earl gart make such provision for the king and his mother, and the embassador, that they had all manner of meats, drinks, and delicates, that were to be gotten, at that time, in all Scotland, either in burgh or land; that is to say, all kind of drink, as ale, beer, wine, both white and claret, malvery, muscadel, hippocras, aqua vitæ. Further, there was of meats, wheat bread, main-bread, and gingerbread; with fleshes, beef, mutton, lamb, veal, venison, goose, grice, capon, coney, cran, swan, partridge, plover, duck, drake, brissel-cock, and pawnes, black cock and muir fowl, cappercallies; and also the stanks that were round about the palace were full of all delicate fishes, as salmonds, trouts, perches, pikes, eels, and all other kind of delicate fishes, that could be gotten in fresh waters; and all ready for the banket. Syne there were proper stewards, cunning baxters, excellent cooks, and potingars, with confections and drugs for their desarts; and the halls and chambers were prepared with costly bedding, vessel, and napery, according for a

king, so that he wanted none of his orders, more than he had been at home, in his own palace. The king remained in this wilderness, at the hunting, the space of three days and three nights, and his company, as I have shewn. I heard men say, it cost the Earl of Athol, every day, in expenses, a thousand pounds."*

IF such was the expense at that time, what would it have been at the present day! As a greater compliment to his majesty, the whole of the building, with all its costly furniture, was, as soon as he had left it, set on fire; and on looking back from a hill on the road, he saw the whole enveloped in smoke and flame.

THE ride from Blair to Dunkeld, which is twenty miles, is by much the most beautiful of any we had met with in our tour, and we should have been very sorry to have missed it, which would have been the case, if, agreeably to our first intention, we had gone from Blair to Taymouth.

ABOUT eight miles above Dunkeld, the Tay receives the Tummel, and by this union becomes one of the finest rivers in Britain; the waters frequently separating and uniting again, form several beautiful islands. Its banks are in general richly wooded, but in one part was an opening, whence we had a fine view of this noble river, meandering through the fertile plain called

* Lindsay's History of Scotland.

Banks of the Tay



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the Blair of Athol; the view was closed by picturesque mountains; down the side of one a cloud was descending, which added to the sublimity of the scene. We gazed on this view for some time, and my friend could not resist the temptation of sketching it: the annexed plate will give a much better idea of it than any verbal description.

As we approached Dunkeld, the woods began to thicken, and the forest became more majestic, and dark with shade, till the road appeared like an avenue.

It was rather late when we arrived at Dunkeld, so that we had only time to take a short view of the city, as it is generally called, though it is a very small place, but it was formerly an episcopal see, and on that account was entitled to the appellation. There is, indeed, reason to believe that it occupied more space than it does at present; for during the commotions of 1689, the greatest part of the houses were burnt by an irritated and licentious soldiery, and such of them as stood to the west and north-west of the cathedral have not been rebuilt, but the ground now forms part of the Duke of Athol's pleasure grounds, or policy, as it is called, in Scotland.

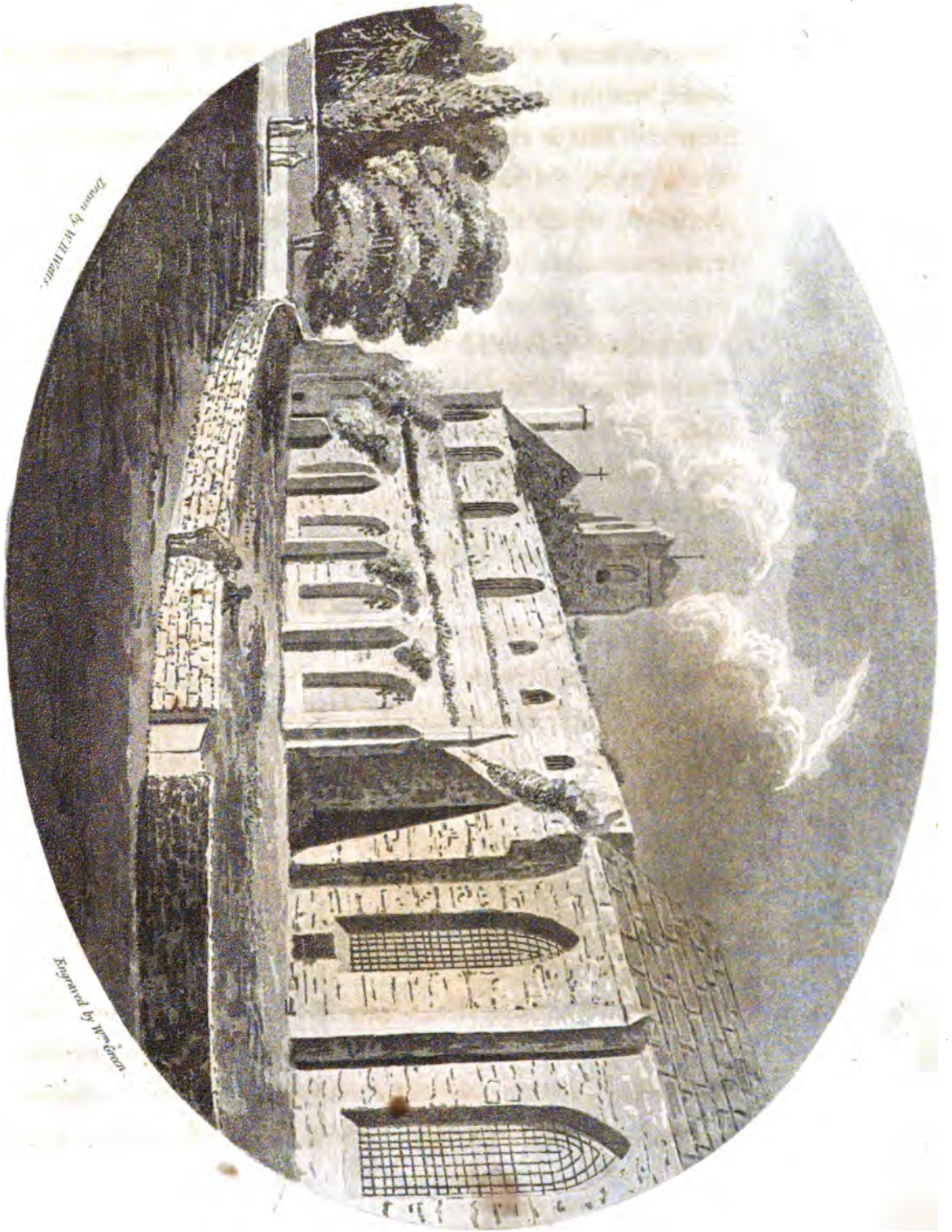
THE name appears to have undergone, in the course of ages, a considerable change; in ancient records it is frequently written *Dunkelden*: it was also sometimes written *Dunechald*, or *Dun-chalden*; which latter, as is observed in the statistical account of

Dunkeld, bears a closer resemblance, both in orthography and sound, to the words from which they are derived, than the former. This is equally true, whether with one class of Gaelic etymologists, the name be considered as derived from *Dun-gbaeldbun*, which signifies the fortress of the Gaels of the hills, or with another class, from *Dun-chalden*, the hill of hazels.

DUNKELD is situated on the north side of the Tay ; it consists of one street, which contains some good houses ; the number of inhabitants is about a thousand : some linen is manufactured here, though the quantity is not considerable.

THIS place is much resorted to in summer, by consumptive patients, chiefly for the opportunity of drinking goats' whey. The air blowing from the Highland hills is extremely pure and exhilarating, and seems to contain at least its share of *oxygen gas*, or vital air, a circumstance which should render it unfavourable to consumptive patients, if the ingenious theory of Dr. BEDDOES be well founded. There are, however, many diseases of the nervous class, in which the serenity of mind, produced by the contemplation of the charming scenery, the purity of the air, and gentle exercise, will afford relief.

AUGUST 3d. The first object that attracted our attention in the morning, was the ruined abbey, of which we had a good view from our window at the inn ; we afterwards inspected it more particularly, in the company of one of the Duke of Athol's



Drawn by W. H. Wears.

Engraved by W. G. Green.

St. Dunstons Cathedral

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gardeners, an intelligent and unassuming man, who conducted us over the pleasure grounds and improvements, and pointed out to us with much attention the picturesque scenery about Dunkeld.

THIS abbey has once been a fine pile of building, though now much dilapidated; the architecture is partly Gothic and partly Saxon, like most of the old abbeys. What remain of it are the tower, the two side aisles, and the nave of the church; these are in ruins, excepting the quire of the cathedral, which is converted into a parish church, and forms a sufficiently commodious place of worship. This quire was begun by Bishop SINCLAIR, and finished by him in the year 1350. In the middle of the eastern gable is to be seen a part of the old wall of the abbey of Culdees, which stood there before the present cathedral was built. The windows of this part, which were originally Gothic, were modernized and diminished in size in the year 1762, when the church was repaired; which has injured their appearance exceedingly; for the old Gothic framing remains, and the interval between it and the glass is filled up with brick-work.

ON the north side of the quire is the chapter-house, which was built by Bishop LAUDER in the year 1469. Above is a chamber occupied by the Duke as a charter room, and below is a vault, which is the burial place of the family of Athol. Out of this part we were conducted into the aisle or body of the cathedral, the ruins of which are exceedingly fine. At the west end are the remains of the large window, which appears to have

been richly ornamented with Gothic work, but has suffered much from time, and the ruthless hands of the reformers. The tower, which stands at the west end of the north aisle, is very elegant ; it was begun by Bishop LAUDER in 1469, and finished by Bishop BROWN in 1501. The most remarkable circumstance respecting this tower, is a singular rent, beginning at the bottom of the uppermost window, and running down the middle of the wall, if I remember right, to the bottom. It is about two inches in width, but we could obtain no account of the time at which it happened, nor of the cause of it. It is conjectured by some to have been owing to a partial sinking of the foundation.*

IN a wall of the south aisle is a monument which has been erected over the grave of one of the bishops, whose figure, in his robes, still lies in the niche that had been cut out for it. The area of this part of the building is used as a burial ground by the inhabitants of Dunkeld.

AT the gate of the church-yard are seen two large stones with "shapeless sculpture deck'd," though so much defaced, that little can be made of them. The figures on one of them seem to have been intended for the twelve apostles ; the other is in the form of a cross.

A PERSON of the name of MARY SCOT was buried near this church in 1728, for whom a singular epitaph was composed, but

* See Stat. Account of Dunkeld.

never engraven on her tomb-stone, though it has been frequently mentioned as copied from it.* One of her descendants is still alive, and is said to have seen her. Though this epitaph is not remarkable for the elegance of its composition, yet as it contains a singular statement of chronological facts, I think my readers will not be displeas'd by its insertion.

STOP, passenger, until my life you read,
The living may get knowledge from the dead.
Five times five years unwedded was my life ;
Five times five years I was a virtuous wife ;
Ten times five years I wept a widow's woes ;
Now, tir'd of human scenes, I here repose.
Betwixt my cradle and my grave were seen
Seven mighty kings of Scotland, and a queen ;
Full twice five years the Commonwealth I saw ;
Ten times the subjects rise against the law ;
And, which is worse than any civil war,
A king arraign'd before the subjects' bar.
Swarms of sectarians, hot with hellish rage,
Cut off his royal head upon the stage.
Twice did I see old prelacy pull'd down,
And twice the cloak did sink beneath the gown.
I saw the Stewart race thrust out ; nay, more,
I saw our country sold for English ore ;

* Stat. Account of Dunkeld.

Our numerous nobles who have famous been,
Sunk to the lowly number of sixteen.

Such desolations in my days have been,
I have an end of all perfection seen.

THE buildings connected with the church formerly occupied a considerable space, containing the monastery, or cells of the monks, with houses for the abbot and bishop, but of these "not a wreck is left behind." This is not peculiar to this abbey; most others have shared the same fate, both in England and Scotland, particularly the latter country. The habitations of the monks were destroyed by the reformers, while in general the places of worship were spared. Indeed JOHN KNOX used in a fury to exclaim, "Down with the nests, and the rooks will fly off;" an exhortation that was eagerly listened to, and cheerfully executed by his zealous followers. Sometimes, however, they did not spare the temple of God itself.

VERY near the abbey is the mansion of the Duke, a plain neat house, without any of the magnificence generally seen in a ducal residence. The situation of this house must, however, strike the stranger as injudicious, being so very near a town which is by no means remarkable for its neatness, when it might easily have been placed on a more distant part of the fine lawn on which it stands. It appears formerly to have been a town-house of the family of Athol, who used to come down from Blair to spend

the winter at Dunkeld, before the rage for London deprived this country of its wealthiest inhabitants. It seems not unlikely that some of the Dukes of Athol had obtained a grant from the Abbot to fix his habitation here, upon the territory belonging to the church, and this may account for the situation of the house. At the Reformation, the greatest part of the church property in Scotland was seized on by the neighbouring nobles, or ceded to them by the crown; while in England, HENRY VIII. took the greatest part of it into his own hands; this appears clearly from the accounts of different historians.* If the town, as has sometimes been proposed, was removed to the other side of the river Tay, the situation of this house would be rendered much more pleasant, at the same time the town would receive several advantages, particularly if a bridge was to be built over the Tay.

THE gardens abound with fruit, which arrives at greater perfection, even in the open air, than could be expected. In a corner of the old gardens is an artificial mound, called Stanley Hill, which was raised by JAMES, Duke of Athol, about the year 1730; this mound is cut into several formal terraces, and kept closely shaven by the scythe. It is planted on the north side with trees, and on the south with shrubs; several small pieces of cannon are placed on the terraces, with inscriptions, which show that they have been brought hither from the Isle of Man, of which the Duke is principal proprietor, and was formerly sovereign.

* See Robertson's History of Scotland, vol. i. book iii. and Guthrie, Scotland, article Church.

THROUGH the gardens we were conducted by a gentle winding path, shaded with trees, up the side of one of the steep and rocky hills that screen the valley of Dunkeld, and which is covered with wood to the summit, excepting where the white rocks are seen through the foliage, and give an air of richness and grandeur to the scene. About a third of the way up, is a hermitage, consisting of a room, partly formed by nature, and partly scooped out of the rock by art, with a fire place, a couch of moss, and every convenience that could be wanted by a hermit, and close to the door falls a crystal stream, to supply his simple but salubrious beverage. Proceeding further up the hill, a fine view opens of the rich valley, through which the magnificent Tay winds towards Perth. On the right is the hill of Birnam, rendered classic ground by the magic pen of Shakspeare; its lower parts are covered with wood. On the left side of the valley, and nearly opposite, at the distance of about fifteen miles, is seen the hill of Dunsinan; on this hill stood the castle of Macbeth, of which some ruins still remain.

ASCENDING still higher towards the north-west, we had a very fine view of the vale of Athol, through which we came the preceding day. We saw the windings of the Tummel and the Tay, and the place of their junction was likewise discerned; the whole of this rich view is bounded on the north by those lofty mountains, which form the boundary of the highland country.

FROM this hill we descended by a zig-zag path on the west side, and having traversed some beautiful avenues on the banks of the Tay, we came to Inver Ferry, where we crossed the river, and passed through the village of Inver; we soon afterwards entered a path which conducted us along the banks of the Bran, a very turbulent stream, that falls into the Tay nearly opposite Dunkeld; pursuing this path, the sides of which are decorated with shrubs and flowers, ornaments quite out of their place, we were amused by the hoarse murmuring of the Bran, dashing along its rocky channel. After having walked near a mile, we came to a neat parterre, ornamented in the style of ground before a citizen's box; at the end of this stands a building, which has the appearance of a small temple, and which purposely hides, from the present view, one of the most charming scenes in nature. .

ON entering this temple, directly opposite is seen a picture of the aged OSSIAN, singing, and some female figures listening to the tales "of the days that are past;" his hunting spear, bow and arrows, are beside him, as well as his faithful dog. This picture, which is well designed and well painted, is the production of the late Mr. STEWART.

ON the picture being removed, by sliding into the wainscot, you perceive that what before appeared to be the temple, is only a vestibule, leading to an elegant apartment, ornamented with exquisite taste. This building is called Ossian's Hall, or The

Hermitage, but the ideas annexed to either of these names are by no means applicable to it.

FROM the windows of this apartment, one of the most beautiful and sublime views bursts on the sight, that the most vivid imagination can conceive. The water of the Bran, after murmuring along the rugged rocks that fill its channel, precipitates itself down a craggy steep, forming one of the most beautiful cascades in nature, the water being broken into a thousand different streams by the abrupt points of the rocks opposing its passage. Indeed, nothing can be more picturesque than the whole scene; the water appearing above the cascade, fretting and foaming among huge fragments of rock, and then dashing down in different directions, stunning the ears with its noise, while the spray which rises from it gives a misty obscurity to the surrounding woods, and an air of magic to the whole, such as words cannot describe. A faithful representation is however given by my friend Mr. WATTS, from which the reader will form a tolerable idea of the scene. Mr. GILPIN, whose taste must be admired by all lovers of picturesque beauty, speaks of this scene as one of the most interesting of the kind he ever saw. "The whole scene and its accompaniments," he observes, "are not only grand, but picturesquely beautiful in the highest degree. The *composition* is perfect, but yet the parts are so intricate, so various, and so complicated, that I never found any piece of nature less obvious to imitation. It would cost the readiest pencil a summer's day to bring off a good resemblance. My poor

The Cascade at Shanksville



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tool was so totally disheartened, that I could not bring it even to make the attempt. The broad features of a mountain, the shape of a country, or the line of a lake, are matters of easy execution. A trifling error escapes notice. But these high finished pieces of Nature's more complicated workmanship, in which the beauty, in a great degree, consists in the finishing, and in which every touch is expressive, especially of the spirit, activity, clearness, and variety of the agitated water, are among the most difficult efforts of the pencil."*

WITHOUT intending any disparagement to Mr. Gilpin, whose powers as an artist I have frequently admired, particularly in his representations of the simple scenes to which he has alluded; I will venture to say, that if the accompanying representation of this scene should ever fall in his way, it will not fail to remind him strongly of the original which gave him so much pleasure, though it did not cost my companion one-sixteenth part of a summer's day. But to a person accustomed to trace all the varieties of the human face, every other part of nature, however complicated, is easy; and though a landscape painter may give an admirable softness to his distant hills, and charm the eye by his disposition of light and shade, yet in the correct representation of scenes like this, he will be excelled by the portrait painter.

THE sides and ceiling of the room are embossed with mirrors, in which the cascade is seen by reflexion, sometimes running

* Observations relative chiefly to Picturesque Beauty, vol. i. p. 122.

upwards, contrary to the direction of gravity, and sometimes in a horizontal stream over the head. Such a room, however elegant, is ill suited to the scenery, and in a great measure destroys the sensations which the latter is calculated to inspire; a rude grotto, or "hall of shells," would have been a much better decoration, and instead of the flowery parterre and walk that leads to it, a simple path, so conducted as to shew, in the most advantageous manner, the different appearances of the river, would have been much more appropriate. Grand and sublime scenes like this, accord but ill with the decorations of art.

"If art

E'er dares to tread; 'tis with unsandal'd foot,

Printless, as if the place were holy ground."

JUST above the cascade, is a little rustic seat, from which is a beautiful view of Ossian's Hall, situated on the top of a perpendicular cliff, forty feet high, and the arch which is thrown over the stream; the whole forming a very fine picture.

LEAVING with regret this charming scenery, we proceeded along a path carried not far from the banks of the Bran. At the distance of about half a mile from the cascade, we came to a cave, partly natural and partly the work of art, with different apartments in it. It is called Ossian's Cave, and might well have served as a retreat or occasional residence of the Celtic bard and warrior. On the side of the principal apartment are the

Designed by W. H. Bartlett



Engraved by Wm. Green

Stephen's Hall

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following lines, which seem to be the address of Malvina to the shade of Oscar.

Oh! see that form which fancy gleams,
'Tis Oscar come to cheer my dreams ;
Ah! wreath of mist! it glides away!
Stay, my lovely Oscar, stay.
Awake, my harp, to doleful lays,
And soothe my soul with Oscar's praise ;
Wake Ossian, first of Fingal's line,
And mix thy sighs and tears with mine.
The shell has ceas'd in Ossian's hall.
Since gloomy Cairbar saw thee fall :
The roe o'er Morven playful bounds,
Nor fears the cry of Oscar's hounds.
Thy four grey stones the hunter spies :
Peace to the hero's ghost, he cries.

There are two more lines, but so defaced as not to be legible.

WE now left the banks of the Bran, and were conducted along a road which I believe is the military road to Stirling. At the distance of about a mile we approached the Bran again, and heard the rude noise of its waters dashing over the rocks. Over the rivulet at this place is thrown an arch about fifteen feet in span, but not less than fifty feet above the water. The banks, which are composed of schistus, approach very near, and form a dreadful chasm, which can scarcely be viewed from the bridge.

without emotions of terror. This bridge, which is nearly formed by nature, the sides of the rock approaching within less than fifteen feet of each other, is called the Rumbling Bridge, on account of the rumbling noise made by water rushing through this narrow chasm.

Just above this bridge, the water of the Bran shooting over a precipice, forms a very fine fall about fifty feet in height, which is broken and turned in different directions by the rocks that oppose it, dashing its waters into a fine spray which arises above the bridge, particularly when the water is swollen by rains. We were informed by our guide that when this spray is copious, and the sun shines upon it, the spectator sees the vapour luminous, and tinged with the beautiful colours of the rainbow. This phenomenon we had not the pleasure of seeing, but could easily conceive that this must be the case when viewed from certain situations, from the principles of refraction, and the analogy of the rainbow. The water having fallen into a deep and narrow glen, runs under a large stone suspended between the rocks, and forming a kind of natural bridge.

THE Bran very much resembles the Bruir; the channels of both are very rugged, and their whole course is a continued scene of turbulence and violence, till they form an alliance with some more sober stream. The restless waters of the Bran are soon lulled to peace in the tranquil bosom of the Tay.

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Sitt Gow

Engraved by W. M. Cook

Drawn by W. M. Cook

Published January 1st 1800 by G. & L. Street

THE greatest part of the day had now been spent, and with much satisfaction, in viewing the interesting scenery in the neighbourhood of Dunkeld. Having seen every thing that deserved attention, we returned nearly by the same road, crossed the Tay at Inver, and took a late dinner at Dunkeld, after which we were favoured with a visit from NEIL GOW, a singular and well-known character, and a celebrated performer on the violin. When I call him a celebrated performer, I do not mean that he can execute the sweet Italian airs with the touch of a Cramer. His only music is that of his native country, which he has acquired chiefly by the ear, being entirely self-taught; but he plays the Scotch airs with a spirit and enthusiasm peculiar to himself. He is now in his seventy-second year, and has played publicly at assemblies, &c. on this instrument, for more than half a century. He is a native of the village of Inver, where he resides, and has acquired, by tuning his lyre, what he considers as an independence, and which is therefore truly such. He favoured us with several pieces of Scotch music: he excels most in the strathspeys, which are jigs played with a peculiar spirit and life; but he executes the laments, or funeral music, with a great deal of pathos. A fine portrait of this noted character has been painted by Mr. RAEBURN of Edinburgh, who may properly be called the Scotch Reynolds. The hasty sketch taken by Mr. WATTS, and here presented to the reader, is however a pretty good likeness.

IN the evening there was a dancing-school ball at the inn, to which we were politely invited, and where we had again an opportunity of hearing Neil Gow, and observing the superiority of the highlanders to our countrymen in dancing; some of the children whom we saw dance this evening, would have cut no disgraceful figure on the stage.

AUGUST 4th. We left Dunkeld early in the morning, for Kenmore, distant twenty-four miles: the object of this journey was to see Loch Tay, and Lord BREADALBANE'S seat at Taymouth; we crossed the Tay at Inver Ferry, and rode along its western banks, which are very beautiful, the country being finely wooded, but the roads are extremely bad. We passed several good houses, and having rode about eight miles, saw the junction of the Tay with the Tummel: here the Tay, whose direction had hitherto been nearly from north to south, turns westward. After travelling about two miles further along its banks, we came to Balnagarde, a very indifferent public house, where we breakfasted, and were charged very exorbitantly, but which charge we thought proper not to pay. This is mentioned merely to show the impropriety of submitting to such charges on the road, whatever be the fortune or condition of the traveller, it being a bad example, and highly injurious to the community.

PROCEEDING still along the banks of the Tay, after a ride of about eight miles from Balnagarde, we came to Aberfeldie,

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Drawn by F. L. Water.

Engraved by W. G. Cooke.

Fall of Alonzo.

an improving little village, where some branches of the muslin manufacture are carried on to a considerable extent by some Glasgow manufacturers.

WE left our horses at the village, and proceeded up the side of the burn of Moness, to see the Falls made by this rivulet about a mile and a half above Aberfeldie, which had been described to us, by a gentleman at Dunkeld, as very beautiful.

WE took a guide from Aberfeldie, who conducted us along a path by the side of the rivulet, through a deep glen, wooded to the top with hazel and birch. The first fall is by no means destitute of beauty, and we should have thought it an object of considerable sublimity, had we not been lately accustomed to so much fine scenery of this kind. Just above this first fall, a little rivulet on the left hand precipitates itself into the burn, which forms some very beautiful cascades. Crossing this rivulet, and advancing along the bottom of the glen, we soon came to the finest part of the scenery, consisting of three successive falls, the height of which is very great. The sides of the glen or linn, which is called the den of Moness, are here stupendously high, and fringed with trees on each side, the branches of which meet and intermingle. As far as can be seen, you observe the whitened foam falling as it were from the sky, and rushing down from rock to rock, the water falls with horrid roar into a deep chasm below. In short, I think that no person who views these falls, will hesitate to pronounce them, in the

words of the celebrated Welsh Tourist, "an epitome of every thing that can be admired in the curiosity of water-falls."*

THE rocks which form the sides of this glen, are chiefly micaceous schistus. The grounds lately belonged to Mr. FLEMING, of Moness, but are now the property of the Earl of Breadalbane.

HAVING been highly gratified by these falls, notwithstanding the many grand and beautiful scenes of this kind which had within the last week fallen in our way, we pursued our journey from Aberfeldie towards Kenmore, six miles distant, still keeping close to the beautiful banks of the Tay. About three miles and a half from Aberfeldie, we passed a Druidical temple on our left, of considerable magnitude, and very entire; we saw a smaller one likewise between Inver and Balnagarde. Soon after we passed this temple, we entered the extensive pleasure grounds of Lord Breadalbane, and saw the house of Taymouth, the residence of this nobleman, overtopped by a grove of venerable trees, which nearly covered the long range of offices. Behind these trees is the Tay, beyond which are mountains covered with wood to the summit. The middle part of the house is old, and built in the form of a castle, with turrets at the corners. This being found too small to accommodate the family, two modern wings have been added. Through the lawn is a road which conducted us to Kenmore, about two miles from Taymouth.

* Pennant's Tour.

Drawn by W. H. West.




Engraved by W. H. West.

Stapledon

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KENMORE* is a small but very neat village, delightfully situated on an isthmus projecting into the eastern extremity of Loch Tay. The church is a handsome structure, and an elegant bridge of five arches is built over the Tay, where it issues from the lake.

LOCH TAY, which is among the most beautiful of British lakes, is fifteen miles long, and from one to two broad. Its depth is said to be in many places a hundred fathoms, and there is no doubt that it must be considerable, from the height and steep slope of the adjacent mountains, which dip their bases in its waters. It winds with undulating lines among the hills, its figure somewhat resembling .

ON a small island near Kenmore, covered with trees, stand the ruins of a priory, which was dependant on the religious establishment of Scone. This priory was founded in the year 1122, by ALEXANDER the first of Scotland, who deposited in it the remains of his queen SYBILL, the natural daughter of HENRY the first of England. At his own death the priory was more liberally endowed, that the monks might say mass for the repose of his own soul, as well as that of his queen.

LOCH TAY abounds with salmon, pike, perch, eels, char, and trout. The salmon, of which we tasted some, are particularly ex-

* This name is derived from the Gaelic *Caen mor* (pronounced Kenmore) signifying *the great head*; probably from its situation on the headland or promontory, projecting into Loch Tay. Stat. Account of Kenmore.

cellent. Lord Breadalbane has the exclusive privilege of fishing there at all seasons. This privilege was granted for the purpose of supplying with fish the monks in the priory on the island, and at the Reformation, or dissolution of the priory, was, along with the island, claimed by this noble family.

THE water of this lake, like some others, has at times suffered violent and unaccountable agitations. The following extract of a letter, written by Mr. Fleming, late minister of Kenmore, in reply to some queries sent him by Professor JOHN PLAYFAIR of Edinburgh, and which is published in the first volume of the Transactions of the Royal Society of Edinburgh, contains the most distinct account of this phenomenon that has been given to the public.

“ ON Sunday the 12th of September, 1784, about nine o'clock in the morning, an unusual agitation was observed in Loch Tay, near the village of Kenmore. That village stands at the east end of the lake, having the river, which there issues from the lake, on the north side, and a bay about 460 yards in length, and 200 yards in breadth, on the south. The greater part of this bay is very shallow, being generally no more than two or three feet deep; but before it joins the body of the lake, it suddenly becomes very deep. At the extremity of this bay, the water was observed to retire about five yards within its ordinary boundary, and in four or five minutes, to flow out again. In this manner it ebbed and flowed successively, three or four

times during the space of a quarter of an hour, when all at once the water rushed from the east and west, in opposite currents, towards a line across the bay; and about the edge of the deep, rose in the form of a great wave, to the height of five feet above the ordinary level, leaving the bottom of the bay dry, to the distance of between 90 and 100 yards from its natural boundary. When the opposite currents met, they made a clashing noise, and foamed; and the stronger impulse being from the east, the wave, after rising to its greatest height, rolled westward, but slowly, diminishing as it went, for the space of five minutes, when it wholly disappeared.

“ As the wave subsided, the water flowed back with some force, and exceeded its original boundary four or five yards, and again returned, and continued to ebb and flow in this manner for the space of two hours, the ebbings succeeding each other at the distance of about seven minutes, and gradually lessening, till the water settled into its ordinary level.

“ At the same time that the undulation was observed in the bay on the south side of the village, the river on the north was seen to run back: the weeds at its bottom, which before pointed with the stream, received a contrary direction, and its channel was left dry above twelve feet from either edge. Under the bridge (which is sixty or seventy yards from the lake) the current failed, and the bed of the river appeared, where there had been eighteen inches of water.

“DURING the whole time that this phenomenon was observed, the weather was calm. It could barely be perceived that the direction of the clouds was from N. E. The barometer (as far as I can recollect) stood the whole of that and the preceding day, about $29\frac{1}{2}$ inches.

“ON the next, and the four succeeding days, an ebbing and flowing was observed nearly about the same time, and for the same length of time, but not at all in the same degree as on the first day. A similar agitation was remarked at intervals, some days in the morning, other days in the afternoon, till the 15th of October, since which time no such thing has been observed.

“I HAVE not heard (although I have made particular inquiry) that any motion of the earth was felt in this neighbourhood, or that the agitation of the water was observed any where but about the village of Kenmore.”

ON the 13th of July, 1794, Loch Tay experienced agitations similar to those described by Mr. Fleming, but they were neither so violent, nor so long continued. With respect to the cause of these agitations, I cannot venture to hazard even a conjecture.

BEING desirous to see the house and grounds of Taymouth, we sent to request permission to do so, which was brought us by Lord Breadalbane's park-keeper, who is appointed to conduct strangers over the improvements. We entered a small gate

near the inn, and followed a path which led us to the top of a small artificial mount, with sloping sides, like the *glacis* of a fortification. From a seat on this mount is a delightful view. On our left was the village and church of Kenmore; directly before us the bridge, with the Tay issuing from the lake; beyond the bridge was the lake, with the island above described, surrounded by picturesque mountains, particularly Benlawers, a very high hill, * with a rugged top, on the right, and Benmore at a great distance, rearing its blue conical head. Indeed the whole forms as pleasing, tranquil, and picturesque a scene as the imagination can conceive. It fascinated the attention of the Ayrshire bard, who has thus beautifully described it :

Th' outstretching lake, embosom'd 'mong the hills,
 The eye with wonder and amazement fills ;
 The Tay meandering sweet in infant pride,
 The palace rising on his verdant side ;
 The lawns wood-fring'd in nature's native taste ;
 The hillock's dropt in nature's careless haste :
 The arches striding o'er the new-born stream ;
 The village glittering in the noon-tide beam. †

LEAVING this seat, and proceeding along a smooth grass walk, under lofty trees, we came to the temple of Venus, from which

* The height of this hill is 4015 feet above the level of the sea. Stat. Account of Kenmore.

† Burns' Poems.

we had a very fine view of the lake, nearly the same as that from the seat we had just left. In this temple is a very fine cast from the celebrated Venus de Medicis.

FROM hence we were conducted by a beautiful shaded walk, along the banks of the Tay, towards the house. The branches of the lime trees approach and meet each other over our heads, at a great height, forming a fine gothic avenue, with all the gloomy grandeur of a cathedral. Some very ingenious writers have supposed that such an avenue gave the first hint to the artist who introduced this style of architecture.

THIS avenue is called the *berceau* walk, and is four hundred and fifty yards long. It has been much blamed by some tourists, as being too artificial; but no person, I think, can enter it without being struck with its magnificence: and there are few, I should imagine, who will not experience a pleasing and awful sensation on contemplating the solemnity of this gothic arch. The walks about Taymouth are all extremely magnificent, and it is in such situations that art exerts itself to advantage. The environs of a mansion are not expected to have the savage rudeness which would suit the hermitage at Dunkeld; all that is required is, that the efforts of art be not trifling and insignificant, but produce an effect corresponding to the surrounding scenery, and the opulence of the proprietor, which certainly has been done here. The hand of a Brown would undoubtedly have given to these grounds more the air of nature, but I question

much if the effect produced upon the mind of a stranger, would have equalled that which he experiences, or at least which I experienced, from the venerable rows of limes, though contrary to the present taste.

BESIDES the clumps and avenues of venerable trees to be met with in the grounds surrounding the house at Taymouth, several of the open spaces contain single trees of very large size, particularly larches and limes, which produce a rich effect. These grounds abound with fallow deer, and there are plenty of roes in the woods.

FROM the berceau walk we crossed the road, and ascended the hill on the other side, where is a building in the form of a fort, containing one good room. On a platform are some small field and garrison pieces, which are fired on particular occasions. From this fort is a charming view of the house and grounds, the river Tay, the lake, and the surrounding country, but by no means adapted to the pencil, it being what artists call a bird's-eye view.

FROM this hill we descended to the house, the situation of which has likewise been frequently criticised and blamed: had it been placed near the temple of Venus, or where the village of Kenmore stands, the prospect would undoubtedly have been much better; but though I have no doubt that the architect paid more attention to a warm and sheltered situation, than to

the prospect, as was the custom at that time, yet I doubt very much if the pleasure which the inhabitants of this mansion receive from the delightful view of the lake, would not have been greatly diminished by having it always in view.

A LATE elegant writer,* when speaking of music, has observed, that the sweetest and fullest chords must be seldom repeated, otherwise the certain effect is satiety; those who are acquainted with the human heart, need not be told that this observation is not confined to music. In my opinion, it is perfectly applicable to the present case; the most beautiful scene constantly viewed, soon palls on the eye; but a short and pleasant walk conducts the family to a view of the lake, and its fine scenery, whenever they are disposed to enjoy it.

THIS house was originally called Balloch Castle, or the castle at the mouth of the lake. It was built by Sir COLIN CAMPBELL, the sixth knight of Loch-Awe, who died in the year 1583.† The rooms are not large, but well-furnished, and contain some very good pictures, which are the only objects worth the attention of the traveller. Among these pictures are a number of portraits by GEORGE JAMIESON, ‡ who has often been called the Scotch Vandyke.

* Dr. Gregory.

† Pennant's Tour.

‡ George Jamieson was born at Aberdeen, about the close of the sixteenth century. Having at an early period of life discovered an uncommon genius for portrait-painting, he went abroad, and studied under the celebrated Rubens, making

IN the room or hall, into which we were first introduced, is a genealogical tree by this artist, containing twenty heads of the family of Lochaw, very finely painted; and in the same room, and a small parlour, are the following portraits by the same master :

- SIR DUNCAN CAMPBELL.
 WILLIAM Earl of AIRD.
 JOHN Duke of ROTHES.
 JAMES Marquis of HAMILTON.
 ARCHIBALD Lord NAPIER.
 WILLIAM Earl of MARISCHAL.
 Earl of LOUDON, Lord High Chancellor.
 THOMAS Lord BINNING.
 JOHN Earl of MARR.
 SIR ROBERT CAMPBELL.
 SIR JOHN CAMPBELL.

IN the drawing-room are very fine portraits by Vandyke of two noble brothers, who made a distinguished figure in the time of Charles I. These are, HENRY RICH, Earl of Holland, a full

a very great progress in his profession. About the year 1690, he returned to his native city, where he settled as a portrait painter, and married. Jamieson's character and style of painting soon became generally known, and admired all over the kingdom. He appears to have painted a great number of portraits, among which are James VI. and Charles I. It is said that when painting the portrait of Charles I. that prince ordered him to keep on his hat, and owing to this circumstance, or as some have thought, in imitation of his master Rubens, in all the pictures of himself he is represented with his hat on. Besides his works at Taymouth, there are several others in Scotland, of which a list is given, and the names of the persons to whom they belong, in the Statistical Account of Aberdeen.

length, which is esteemed one of the best works of that great master; and Robert Earl of Warwick, his elder brother, who was high Admiral of England, in the service of the parliament. In the dining-room are some family portraits of a later date by eminent painters.

IN a small parlour at the west end of the house, among several good pictures, is a fine scripture-piece by WEST, and in a room at the east end, a most charming picture by GAVIN HAMILTON, of Scipio restoring the beautiful Spanish captive to her parents and betrothed husband Allucius. The artist seems to have seized the very ideas, and made her countenance speak the sentiments attributed to her by the historian. "Oh! wondrous youth, does not that obliged virgin give you, while she prays to the gods for your prosperity, raptures above all the transports you could have reaped from the possession of her injured person?" It is scarcely necessary to observe, that the relations of the young lady had brought with them a very considerable sum for her ransom; but when they saw that she was restored to them in so generous and godlike a manner, they entreated the conqueror, with great earnestness, to accept that sum as a present, and declared that his compliance would complete their joy and gratitude. Scipio told them that he accepted the gift, and ordered it to be laid at his feet; then, addressing himself to Allucius, "I add," says he, "to the portion which you are to receive from your father-in-law, this sum, which I desire you to accept as a marriage present." The subject is worthy the pencil of any

artist, and in my opinion Mr. Hamilton has done it ample justice. The man who can view this picture without feeling his soul warmed by the generous character of the conqueror,

Is fit for treasons, stratagems, and spoils.

HAVING seen what was remarkable at Taymouth, we returned to Kenmore, and had an opportunity of seeing more of the village than we had been able to do in the preceding part of the day.

THE village of Kenmore is well built, the houses are very comfortable habitations, and the noble proprietor has peopled it with such inhabitants as may be of use in the neighbourhood; there is one mechanic in each of the most useful branches, i. e. one blacksmith, one shoemaker, one tailor, &c. Indeed the character of this nobleman is spoken of with great respect.

YET though he is said to be more indulgent to his tenants than most landlords, we heard of numbers who had left this part of the country for America, and of others who intended to follow their example. His lordship, some years ago, stopped a party of emigrants from some of the northern districts, and settled them advantageously on his own grounds in Glenorchay, a deed worthy of him. It cannot be too often repeated, that proprietors ought to give every reasonable encouragement to their tenants, and particularly to grant them leases, otherwise the temptations held out to them by their transatlantic friends, of

reaping the fruits of their labour, and sitting under their own vine and their own fig-tree, may deprive Britain of a hardy and useful body of men.

EVEN now, methinks, as pondering here I stand,
I see the rural virtues leave the land :
Down, where yon anchoring vessel spreads the sail,
That idly waiting, flaps in every gale,
Downward they move, a melancholy band,
Pass from the shore, and darken all the strand. *

THE highland dress is more common here than in any other part of the country through which we passed. This dress bears a considerable resemblance to that of the ancient Romans, from which it may perhaps have been derived. It consists of a short jacket of tartan or woollen cloth, woven in squares of the most vivid colours, in which green and red are however predominant; the Philabeg, or Kilt, which is a sort of short petticoat reaching to the middle of the thigh, of the same stuff; of hose, or half stockings, which do not reach the knee, knit or wove in diamonds of red and white. They have generally, when dressed, a pouch made of the skin of the badger, fox, or some other animal, hanging before, in which they keep their tobacco and money. They wear a mantle, or plaid of tartan, which is folded in a graceful manner over the shoulder, but covers the whole body when it rains. Instead of a hat they wear a blue bonnet, with a

* Goldsmith.

border of red and white. This dress, which is much more picturesque than the modern, is fast wearing out in the highlands; many dress in the English manner, and still more have a mixture of the highland and English; for instance, many have a hat and short coat, with kilt and hose; while others have no other part of this dress than the hose and bonnet.

AUGUST 5th. The inn at Kenmore is a very comfortable house; here we slept, and after breakfast crossed the Tay, by the bridge at the mouth of the lake, and rode down the northern banks of that river, which are very pleasant, and presented several fine views. After riding about two miles and a half by the side of the Tay, we came to the Lyon, a very fine river, rising from a lake called Loch-lyon, on the borders of Argyleshire, and after having run through a considerable district of very mountainous country, falls into the Tay near this place. Going about a quarter of a mile up the banks of this river, we crossed it by a bridge, and proceeding down the other side, soon came again to the Tay, augmented by its alliance with the Lyon. Shortly afterwards we passed the village of Dull, and after riding a few miles, we came to Castle Menzies, the seat of Sir JOHN MENZIES, a turreted building, surrounded by lofty trees, and screened on the north by a rocky hill wooded to the top; near this castle is the village of Weem or Weyms.

At the distance of about eighteen miles from Kenmore, we came to Logierait, a village of considerable size, near the con-

flux of the Tay and the Tummel, where we dined, and after dinner surveyed the place, in which we saw nothing remarkable, or worthy of attention.* Among the superstitious customs remaining in the highlands, the following singular one still practised in this neighbourhood, is mentioned in the statistical account of Logierait :

IMMEDIATELY before the celebration of the marriage ceremony, every knot about the bride and bridegroom (garters, shoe-strings, strings of petticoats, &c. is carefully loosened. After leaving the church, the whole company walk round it, keeping the church walls always on the right hand. The bridegroom, however, first retires one way with some young men, to tie the knots that were loosened about him ; while the young married woman, in the same manner, retires somewhere else, to adjust the disorder of her dress.

WE ferried over the Tummel, at the distance of about a quarter of a mile from Logierait, and coming into the road from Blair to Dunkeld, which we had travelled before, soon reached the latter place.

AUGUST 6th. Early in the morning we set out for Perth, which is fifteen miles distant; the road is good, and the country pleasant and well cultivated. About two miles from Dunkeld we passed the hill of Birnam, on our right, which is now in a

* This place gave birth to Dr. Adam Ferguson.

great measure denuded of its wood; on the side of this hill has lately been opened a very fine quarry of blue slate.

A LITTLE further on our left, we saw the hospital founded by one of the family of Stewart of Grandtully, for the maintenance of a certain number of poor persons. The house is not at present inhabited, the pensioners choosing rather to live in cottages among their friends, where they enjoy more comfortably the benefit of the small pensions left them by the same benevolent individual.

WE next passed over a moorish track, by no means so well cultivated as that we had left, but soon came to an open plain, in which the progress of agriculture and manufactures was very visible; several bleach grounds and cotton mills are established here.

ON this plain, called the plain of Luncarty, are seen a number of artificial hillocks, or tumuli, which indicate that it has formerly been a field of battle; and history informs us, that an important victory was gained here in the year 976 by the Scots, over the Danes who had invaded the country, and advanced to this distance from the eastern coast. The Danes, at first, had the advantage, and the Scots army, overpowered by numbers and superior discipline, were retreating before their enemies, when the fortune of the day is said to have been changed by the following circumstance: A peasant, who may be called the Cincinnatus of Scotland, happened, with his two sons, to be plough-

ing a field, since called *Dalmacoing*, or Yoke Haugh, on the day of the battle of Luncarty; hearing the fate of the battle, and seeing the Scotch army retreating this way, he was instantly fired with heroic indignation, and, together with his sons, seized each of them the yoke of an oxen plough, persuaded their countrymen to rally, and marching at their head, they met the Danes on the banks of the Tay near Caputh, where a second action ensued, in which this hero exhibited prodigies of valour, and his enemies were completely defeated. In consequence of this, he was dignified by his sovereign with peculiar honours, obtained the name of HAY, and the instrument he fought with for his arms. The yoke and motto *sub jugo* is still the arms of the noble family of Kinnoul, who are said to be descended from this rustic hero.

WE arrived at Perth about ten o'clock, and after having breakfasted, we went to take a view of the city,* which is one of the handsomest towns in Scotland, and built upon a much more regular plan than any of them, if we except the new town of Edinburgh. It is said to contain twenty thousand inhabitants, which account is perhaps somewhat over-rated, but the common computation from births and burials gives between sixteen and seventeen thousand. It is situated on a fine plain, on the west side of the Tay, which is here a noble river; this plain has undoubtedly been formerly the bed of the river, which, like many

* In several of the public writs, especially in the time of James VI, it is called the city of Perth.

others, has embanked itself by means of the stones, mud, and other substances brought by its waters. The extensive and rich plain called the Carse of Gowrie, stretching on both sides of the Tay, from Perth down to its junction with the sea near Dundee, and which reminds one of many of the richest parts of the south of England, has undoubtedly, at some remote period, been covered by the river. This is evident from its flat appearance, when viewed from any of the neighbouring eminences, particularly the hill of Kinnoul, or Moncrief hill. The soil being washed away by mountain torrents, which fall with great force into the rivers, begins to be deposited when the velocity of the river decreases, particularly towards the sides, where the velocity is least; by this means the stream becomes gradually contracted, leaving a fine plain of sand and vegetable soil, highly proper for cultivation. In proof of this it may be observed, that the stratum below the soil in this valley, consists of sand and rounded pebbles, and that some persons digging a well near Perth, found, at the depth of three fathoms below the bed of the Tay, chairs, tripods, and other pieces of household furniture, which must have been deposited there when that part was covered with water, as a great many pebbles, and a quantity of river sand, were found above them.

PERTH is surrounded by, or rather divides a spacious plain, into what are called the north and south inches; each of which measures about a mile and a half in circumference. They have

probably been what their name signifies, inches, or islands, when the bed of the Tay was more extensive. These inches are used as public walks by the inhabitants, and likewise as public places for the washing and drying of linen, as is common in many parts of Scotland. The Tay flows here in a direction nearly north and south, but a little below Perth it turns eastward, and is lost behind the hill of Kinnoul. The tide from the German ocean flows up the river, and reaches about two miles above Perth; the river is navigable to Perth for sloops and small craft, and in spring tides for ships of considerable burthen, which come close to the town.

OVER the Tay is thrown a handsome bridge of nine arches, which cost about twenty-five thousand pounds. To this work, a considerable sum was contributed by government out of the forfeited estates, the magistrates gave as much as could be spared out of the public funds, and about seventeen thousand pounds were raised by public subscription. The late patriotic Earl of Kinnoul procured a loan on the credit of a toll to be levied, which made up what was still wanted to defray the expense. The debt, thus contracted, has been discharged, and the toll abolished. Indeed it was chiefly owing to the public spirited exertions of this nobleman, that this useful structure was begun and completed. It extends over the greatest weight of water in Britain. The communication used formerly to be by means of a wooden bridge; but this was very unsuitable to the width and

force of the river: five bridges built before this, were washed away by the floods, which frequently swell the river to an uncommon magnitude, and give to its waters almost irresistible force; but this structure has withstood some very powerful attacks from the furious element, and it is hoped will long remain a glorious monument of the power of art over nature.

THE salmon fishery on the Tay is very extensive, and the rent has increased considerably of late; it may now be stated at 7,000*l.* sterling *per annum*, of which Perth draws about 1000*l.* The fishing begins on the 11th of December, and ends on the 26th of August. The spring, and part of the summer fish, go fresh, packed in ice, to the London market; and when they are plentiful in warm weather, they are pickled, and sent to the same place.* A man is stationed constantly on the bridge, both day and night, when the latter is not very dark. When he sees a fish go up the river, he makes a signal to some fishermen in a hut about 200 yards above, who immediately take to their boat, and intercept it.

THIS city has increased very much in magnitude and population of late years, owing to the rapid increase of its trade and manufactures, for which no place in Britain is better situated. There is a constant intercourse by water between London and Perth: every four days, at least, during the fishing season, a

* Stat. Account of Perth.

smack sails, and in general makes the passage within the week, if the weather be any way favourable; indeed the passage to London has often been performed within sixty hours. Besides the fishing smacks, which return loaded with porter, cheese, groceries, and other goods, for the consumption of the town, there are a number of vessels that convey the manufactured goods to different parts of the world.

THE staple manufacture of Perth is linen, but of late a considerable quantity of cotton goods has been manufactured, which last branch is daily increasing. There are upwards of 1,500 looms employed in the town and suburbs, which manufacture linen and cotton goods annually to the value of 100,000*l.* sterling. Besides this, there is at least 120,000*l.* more in value of linen manufactured in the neighbourhood, and purchased in the Perth market by the dealers.

THE different fabrics, as well as the general purposes to which they are applied, may be seen by the following arrangement, drawn up by a committee of gentlemen, at the request of the literary and antiquarian society. Of this committee, Mr. JOHN YOUNG, a gentleman well versed in commercial affairs, was chairman,* and, as such, signed the report, which as an au-

* To this gentleman we were indebted for much polite attention during our stay at Perth.

thentic document of the state of manufactures in Perth in the year 1794, I shall transcribe.

1. * Brown and white fine-threaded linens, denominated <i>Silesias</i> , chiefly printed for handkerchiefs; with <i>Britanias</i> , <i>Kentings</i> , &c. for export trade, may be estimated above - - - - -	} £.120,000
* Perth has long been famed for manufacturing these articles.	
2. Stout Holland sheetings, of various breadths; with $\frac{7}{8}$ and $\frac{1}{4}$ Holland shirting, and a few long lawns, above - - -	} 12,000
3. Four-fourths wide brown and white country linen, chiefly used for hat-linings, buckrams, &c. Brown Hollands, Hessians, pack-sheetings, and other coarse fabrics, manufactured in the neighbourhood; including soldiers' shirtings, with a few coarse shēetings, and Osnaburghs purchased - - - - -	} 20,000
4. Five-fourths wide umbrella linens, and linens for window blinds, &c. above - - - - -	} 8,000
5. The cotton manufacture was rapidly extending, but met with a severe check the last summer, by a reduction of the value of goods manufactured, and has not yet recovered its former vigour. The shock did not affect the linen manufactures in a similar degree.	} 60,000
Shawl cloths, calicoes, and muslins, with a very few pulicate handkerchiefs, are produced from cotton-yarn, which were estimated, within bounds, at 80,000 pounds sterling per annum; but owing to the late check, shall only be extended to - - - - -	
Total amount of the linen and cotton goods, which the committee are confident is under-rated - - -	} £.220,000

It may be proper to observe, that the cotton manufacture is now in a very flourishing state, and carried on to a much greater

98 LEATHER AND GLOVE MANUFACTURE.

extent than when this report was drawn up, a great number of cotton mills and print works having been erected, and bleach fields established in the neighbourhood of Perth. It is thought that the linen manufacture has not increased proportionally.

BESIDES the manufactures I have mentioned, considerable quantities of leather and shoes are manufactured here. The manufacture of shoes and boots, chiefly for the London market, is carried on to the extent of at least 8,000/. per annum; and at the different tan works are prepared from 4 to 5000 hides, and about 500 dozen of calf-skins annually; the annual extent of this manufacture is estimated at 10,000/*.

A MANUFACTURE of gloves has been carried on here to a considerable extent for a long time; the vicinity of Perth to the Highlands, and consequently the ease with which the skins of deer and other animals are procured, probably at first gave origin to it. From two to three thousand dozen of pairs of gloves are manufactured yearly. The glovers are incorporated along with the skinners, and this corporation is the richest in Perth. The skinners dress about thirty thousand sheep- and slaughtered lamb-skins annually, more than twenty thousand of these are of sheep killed in Perth: the rest are brought from the neighbouring country, and the Highlands. Most of these skins are sent to the London markets, and are much esteemed for their cleanness from grease, and fine grain.

* Stat. Account of Perth.

THE printing business has likewise been carried on, for some years, to a very considerable extent by the MORRISONS, who have printed some fine editions of the Scottish poets, and an Encyclopedia. They print from twenty to thirty thousand volumes annually.

It may be expected, that a town of such opulence and spirit will be provided with banks. A respectable banking company has been established several years; and here is likewise a branch of the bank of Scotland.

THE town has been much enlarged within the last ten years, several new streets having been opened in all quarters. A new town is to be built on the ground formerly occupied by the monastery of the Black Friars. In Perth, different streets and lanes appear to have been very early allotted to the different craftsmen, who, with very few exceptions, still inhabit the same quarter of the town, and often the same streets. The skippers, for instance, live in one street, with certain adjacent closes and alleys; the weavers in a second; the hammermen in a third; the shop-keepers, or, as they are generally called in Scotland, the merchants, in a fourth, and so on; these respective streets being denominated from the nature of the business that is carried on in them.

BUT while Perth has paid so much attention to manufactures and commerce, we are not to suppose, that, like many of the

English manufacturing towns, they neglect the important business of education. Indeed, much more attention is paid to it in Scotland than in England. In some of the southern counties of England, many persons are to be met with who can neither read nor write; whereas, in most parts of Scotland, almost every person is able to read, and most of them can write.

THE grammar school of Perth has long been accounted one of the first in Scotland. It has produced many eminent statesmen, physicians, lawyers, divines, and several poets above mediocrity.

AMONG the celebrated men educated here, may be mentioned CRIGHTON of Clunie, commonly called the admirable Crighton; the late earl of Mansfield likewise received the rudiments of his education here.

THIS school now serves to prepare young men for the academy, by instructing them in the elementary parts of classical education. There is a rector, and two assistant masters.

Mr. DICK, the present rector, has a salary of 50*l.* per annum.

Mr. SWAN,	} assistant masters. - - 25 <i>l.</i> each.
Mr. ROBINSON,	

THE school fees are five shillings a quarter, and a small donation is, besides, generally given by the pupils to each master, annually. The building is situated in South-street. The num-

ber of scholars is now seldom more than sixty, it being on the decline, on account of boys leaving it sooner than usual for

THE ACADEMY,

AN excellent institution for young men intended for business, and even the learned professions. It was set on foot in the year 1761, at the earnest desire of several gentlemen in the town and neighbourhood, who thought Perth a place particularly proper for a seminary of this kind, for the following reasons :

1. IT is a considerable distance from any of the universities.
2. THE situation of the town is remarkably pleasant and healthy.
3. IT is the centre of a very populous country, and is the place with which the Highlands of Scotland have the greatest correspondence, so that an institution of this kind would correspond with the national plan of improving and civilizing the Highlands.
4. PROVISIONS of all kinds are to be had at a reasonable rate, and there is good accommodation for such gentlemen as might either choose to send their children to board, or reside with their families in Perth, during their education.
5. THE people in general are of a sober and industrious disposition, so that the manners of youth are here in less danger of being corrupted than in any of the larger towns.

INDUCED by these considerations, the magistrates and council agreed to erect a commodious building, with proper apartments for the accommodation of the different classes. The first session was opened in October 1761, about forty students attending: the honourable JOHN MURRAY of Strowan (afterwards Duke of Athol) was unanimously chosen president for the first year, and accepted the office.

Four Tutors belong to the Academy.

Mr. GIBSON, the rector, has a salary of - - £. 50 per annum.

Mr. WALLIS, assistant tutor - - - - - £. 25.

The Abbé QUINTIN, French master - - £. 25.

Mr. JUNOR, who teaches writing and draw-

ing - - - - - £. 25.

THE students generally remain at the academy two years, the first of which is employed in acquiring a knowledge of arithmetic, and the different exchanges with various countries, book-keeping, drawing, French, Euclid's elements, plane trigonometry, mensuration of surfaces, land surveying, mensuration of solids, gauging, navigation, fortification, &c.

THE second year they study spherical trigonometry, natural and experimental philosophy, in all their branches, algebra, fluxions, &c. The fees are, to Mr. Gibson the rector, two guineas, and to Mr. Wallis half a guinea each year. For draw-

ing and French, half a guinea a quarter each. The number of students is about eighty, and increases every year.*

THIS academy is opposite the west end of St. John's church, and is furnished with a very well selected philosophical apparatus.

AFTER what has been said of the utility of such institutions, in speaking of the academy at Inverness, it is unnecessary to add more here: it may be observed, however, that if such institutions are found useful in Scotland, which possesses several excellent universities, where youth may be educated at a trifling expense, they are still more necessary in many parts of England, that are at a great distance from the two universities; which, though in point of public buildings and funds, they are vastly superior to any seminaries of the kind in the world; their admirers cannot deny that the education of youth is very expensive, even if they should be disposed to dispute the point concerning the corruption of morals which attends the association of students in large bodies. The point which I am anxious to establish is, that it would be highly to the advantage of England to convert many of the grammar schools into institutions similar to these academies. Moderate salaries might be given to a few tutors, to secure them from want, but they should depend, for their emoluments, chiefly on the number of their pupils.

* This account of the academy was procured for me by Mr. Watts, from one of the gentlemen concerned in the management of it.

A LITERARY and antiquarian society has existed at Perth for some time, and has, like all similar institutions, contributed to diffuse a taste for these subjects among persons who would probably otherwise never have thought of them. This society was at first confined to antiquities, and was set on foot in 1784, by a minister of Perth, who had a great taste for these researches. In the year 1787, the plan was extended to the cultivation of philosophy, polite literature, and the fine arts, and forms what the French would call an academy, while to the Perth academy they would apply the name of college.

THIS society has made a considerable collection of books, original essays, ancient manuscripts, coins, medals, and subjects of natural history, with other materials suitable to the design of its institution. The ordinary meetings of the society are held on the last Tuesday of every month.

THERE is likewise a public subscription-library at Perth, well furnished with books.

THIS town is of considerable antiquity, and is supposed to have been in existence at the time that the Romans extended their arms to the banks of the Tay ; though it may be presumed from the rude state of the arts, and the wandering manner of life led by the inhabitants of this country, that it could consist of nothing more than an irregular collection of huts, scarce deserving to be called a town. It would appear from the

Itinerary of Richard of Cirencester, that this town was first built and fortified by Agricola, while he carried his victorious arms north of the Forth, and was by him called Victoria. The Picts, after their conversion to christianity, consecrated the church which they had built to St. John the Baptist, whom they chose as the tutelar saint of the town; hence it came to be called St. Johnston. On some of the seals appended to the charters of the religious houses of Perth, is represented the decollation of St. John the Baptist; on the reverse is the same saint enshrined, and a number of priests kneeling before him. The legend is, *S. communitatis ville sancti Jobannis Baptiste de Berth.**

THE Celtic name of the town, or perhaps that given it by the Picts, seems to have been Bertha, which has been corrupted or changed to Perth. The ancient Bertha is said, by Boethius, to have been situated on the banks of the Almon, a river which falls into the Tay at a little distance, but that in the year 1200 the town, with the ground on which it stood, was swept away in one night, by a dreadful inundation in the rivers Tay and Almon, aided by a high spring tide. In this calamity many of the inhabitants lost their lives, and still more their property. An infant son of the king, with his nurse, and fourteen domestics, were among the number of those who perished. The present town was built on a plain about two miles below.

OF the ancient splendour of Perth there are but few remains; among these may be mentioned the parish church, Gowrie house,

* Stat. Account of Perth.

and the parliament house, which last is converted into dwelling houses. There remain also the houses of some of the nobility, such as that of the Earl of Errol, Earl of Athol, and Bishop of Dunkeld.

THE parish church is a large building in the form of a cross, the architecture is a very fine style of Gothic. It is now divided into three churches or places of worship.

GOWRIE house was built by the Countess of Huntley about the year 1250, and is now occupied as barracks. This house is shown to every stranger who visits Perth, on account of an attempt said to have been made by the Earl of Gowrie, on the fifth of August, 1600, to assassinate James VI. who called for help out of a window, and was rescued by his attendants rushing into the room. It is deemed incumbent on every visitor of the house to look out of this window.

AMONG all the doubtful facts which history hath attempted to develop, this is one of the most mysterious. Whether James intended to assassinate the Earl of Gowrie, or whether the Earl intended to assassinate him, or whether any assassination was intended on either side, as Mr. Gilpin observes, is equally doubtful. Circumstances very improbable attend any of these suppositions. Dr. Robertson wishes to make it appear that the Earl intended only to get James into his power, for political purposes. The following is an outline of the story, as related by this celebrated historian.

“THE immediate actors in this conspiracy, were John Ruthven, Earl of Gowrie, and his brother Alexander. They were sons of the Earl who was beheaded in the year 1584. Nature had adorned both these young men, especially the elder brother, with many accomplishments, to which education had added its most elegant improvements. More learned than is usual among persons of their rank; more religious than is common at their age of life; generous; brave; popular: their countrymen, far from thinking them capable of any atrocious crime, conceived the most sanguine hopes of their early virtues. Notwithstanding all these noble qualities, it would appear that some unknown motive engaged them in a conspiracy, which, if we credit the account given by the king, and commonly received, must be transmitted to posterity as one of the most wicked, as well as the worst concerted, of which history makes any mention.

“ON the 5th of August, in the year above mentioned, as the king, who resided during the hunting season in his palace of Falkland, was going out to his sport early in the morning, he was accosted by Alexander Ruthven, who with an air of great importance told the king, that on the preceding evening he had met an unknown man, of a suspicious aspect, walking alone in a by-path near his brother's house at Perth; and on searching him, had found under his cloak a pot filled with a vast quantity of foreign gold; that he immediately seized both him and his treasure, and, without communicating the matter to any person, had kept him confined and bound in a solitary house; and that

he thought it his duty to impart such a singular event first of all to his majesty. James immediately suspected this unknown person to be a trafficking priest, supplied with foreign coin, in order to excite new commotions in the kingdom; and resolved to empower the magistrates of Perth to call the person before them, and inquire into all the circumstances of the story. Ruthven violently opposed this resolution, and, with many arguments, urged the king to ride directly to Perth, to examine the matter with his own eyes; meanwhile the chace began; and James, notwithstanding his passion for that amusement, could not help ruminating on the strangeness of the tale, and on Ruthven's importunity. At last he called him, and promised, when the sport was over, to set out for Perth. The chace however continued long; and Ruthven, who all the while kept close by the king, still called him to make haste. At the death of the stag, he would not allow James to stay till a fresh horse was brought him; and observing the Duke of Lennox and the Earl of Marr preparing to accompany the king, he intreated him to countermand them. This James refused; and though Ruthven's impatience and anxiety, as well as the apparent perturbation in his whole behaviour, raised some suspicions in his mind, yet his own curiosity, and Ruthven's solicitations, prevailed on him to set out for Perth. When within a mile from the town, Ruthven rode forward to inform his brother of the king's arrival, though he had already dispatched two messengers for that purpose. At a little distance from the town, the Earl, attended by several of the citizens, met the king, who had only twenty per-

sons in his train. No preparations were made for the king's entertainment; the Earl appeared pensive and embarrassed, and was at no pains to atone by his courtesy for the bad fare with which he treated his guest.

“WHEN the king's repast was over, and his attendants were led to dine in another room, Ruthven whispered him, that now was the time to go to the chamber where the unknown person was kept. James commanded him to bring Sir Thomas Erskine along with them; but instead of that, Ruthven ordered him not to follow; and conducting the king up a stair-case, and then through several apartments, the doors of which he locked behind him, led him at last to a small study, in which there stood a man clad in armour, with a sword and dagger by his side. The king, who expected to have found one disarmed and bound, started at the sight, and inquired if this was the person; but Ruthven snatching the dagger from the girdle of the man in armour, and holding it to the king's breast, ‘Remember,’ said he, ‘how unjustly my father suffered by your command; you are now my prisoner; submit to my proposal without resistance, or outcry, or this dagger shall avenge his blood.’ James expostulated with Ruthven, intreated and flattered him. The man whom he found in the study, stood all the while trembling and dismayed, without courage either to aid the king, or to second his aggressor. Ruthven protested, that if the king raised no outcry, his life should be safe; and, moved by some unknown reason, retired in order to call his brother, leaving

to the man in armour the care of the king, whom he bound by oath not to make any noise in his absence.

“WHILE the king was in this dangerous situation, his attendants growing impatient to know whither he had retired, one of Gowrie’s attendants entered hastily, and told them the king had just rode away towards Falkland. All of them rushed out into the street, and the Earl, in the utmost hurry, called for their horses to be got ready. By this time, his brother had returned to the king, and swearing that there was now no remedy, but that he must die, offered to bind his hands. Unarmed as James was, he scorned to submit to that indignity; and closing with the assassin, a fierce struggle ensued. The man in armour stood, as formerly, amazed and motionless; and the king dragging Ruthven towards a window, which, during his absence, he had persuaded the person with whom he was left, to open, cried with a wild and affrighted voice, ‘Treason! treason! help! I am murdered!’

“His attendants heard and knew the voice; and saw at the window a hand which grasped the king’s neck with violence. They flew with haste to his assistance: Lennox and Marr, with the greater number, ran up the principal stair-case, where they found all the doors shut, which they battered with the utmost fury, endeavouring to burst them open. But Sir John Ramsay, entering by a back stair-case which led to the apartment where the king was, found the door open; and rushing upon Ruthven,

who was still struggling with the king, struck him twice with his dagger, and thrust him towards the stair-case, where Sir Thomas Erskine, and Sir Hugh Herries, met and killed him; he crying with his last breath, 'Alas! I am not to blame for this action.' During this scuffle, the man who had been concealed in the study escaped unobserved. Together with Ramsay, Erskine, and Herries, one Wilson, a footman, entered the room where the king was, and before they had time to shut the door, Gowrie rushed in with a drawn sword in each hand, followed by seven of his attendants well armed, and with a loud voice threatened them all with instant death. They immediately thrust the king into the little study, and shutting the door upon him, encountered the Earl. Notwithstanding the inequality of numbers, Sir John Ramsay pierced Gowrie through the heart, who fell down dead without uttering a word; and his followers, having received several wounds, immediately fled. Three of the king's defenders were likewise hurt in the conflict. A dreadful noise still continued at the opposite door, where many persons laboured in vain to force a passage: and the king being assured that they were Lennox, Marr, and his other friends, it was opened on the inside. They ran to the king, whom unexpectedly they found safe, with transports of congratulation; and he, falling on his knees, with all his attendants around him, offered solemn thanks to God for so wonderful a deliverance.

“ THE danger, however, was not yet over. The inhabitants of the town, whose provost Gowrie was, and by whom he was ex-

112 MOTIVES TO THE CONSPIRACY UNKNOWN.

remely beloved, hearing the fate of the two brothers, ran to their arms, and surrounded the house, threatening revenge, with many insolent and opprobrious speeches against the king. James endeavoured to pacify the enraged multitude, by speaking to them from the window; he admitted their magistrates into the house; related to them the whole circumstances of the fact; and their fury subsiding, by degrees they dispersed. On searching the pockets of the Earl for papers, which might discover the designs of his accomplices, nothing was found but a small parchment bag full of magical characters, and words of enchantment; and in the account of the conspiracy published by the king, it is asserted, that while they were about him, the wound of which he died bled not, but as soon as they were taken away, the blood gushed out in great abundance.

“ AFTER all the dangerous adventures of this busy day, the king returned in the evening to Falkland, having committed the dead bodies of the two brothers to the custody of the magistrates of Perth.* ”

NOTWITHSTANDING the minute detail, as Dr. Robertson observes, which the king gave of all the circumstances of this conspiracy against his life; the motives which induced the two brothers to attempt an action so detestable, the end they had in view, and the accomplices on whose aid they depended, were altogether unknown. Three of the Earl's attendants being con-

* Robertson's History of Scotland, Book VIII.

victed of assisting him in his assault on the king's servants, were executed at Perth; but they could give no light into the motives which had prompted their master to such an action. Diligent search was made for the person concealed in the study, and from him great discoveries were expected. But Henderson, the Earl's steward, who, upon a promise of pardon, confessed himself to be the man, declared he was as much a stranger to the designs of his master as the rest; and though placed in the study by Gowrie's command, he did not even know for what end that station had been assigned him.

THE contest which followed between James and his clergy, after this mysterious event, is truly ridiculous. He could not prevail upon them to allow that an attempt had been made upon his life, and therefore to thank God publicly for his escape. Some of them were on this account banished to England.

THERE were formerly a great many religious houses and establishments in Perth, which were mostly destroyed at the time of the Reformation. Among these may be enumerated the following :

1. THE Dominican, or Black Friars monastery, founded by Alexander II., in 1231.
2. THE monastery of White Friars, or Carmelites, which was founded in the reign of Alexander III.

3. THE Charter-house, or monastery of Carthusians, founded by James I., in 1429.
4. THE Franciscan, or Gray Friars monastery, founded by Lord Oliphant, in 1460.

BESIDES the parish church of St. John Baptist, which still remains, and the church which made part of the buildings of these four monasteries, there were nine chapels, some of which had hospitals for the poor and sick, and likewise small nunneries annexed to them. All these churches and chapels were filled with altars consecrated to the various saints, and each of the altars had one officiating chaplain, or more, when more than one saint was honoured at the same altar.*

IT was at Perth that the reformed religion was first publicly avowed; to this place John Knox repaired, on his return to his native country from Geneva, where he had passed some years in banishment, and where he had imbibed, from his commerce with Calvin, the highest fanaticism of his sect, which was augmented by the natural ferocity of his temper.

HAVING been invited back to Scotland, he, on Thursday the 11th of May, 1559, preached a sermon in the parish church of Perth, against idolatry. After the sermon, a priest was so imprudent as to open his repository of images and relics, and pre-

* Stat. Account of Perth.

pare to say mass. The audience, having caught the enthusiasm of Knox from his sermon, were in a disposition for any ferocious enterprise. They attacked the priest with fury, broke the images in pieces, tore the pictures, overthrew the altars, scattered about the sacred vases, and left no implement of idolatrous worship, as they termed it, entire or undefaced. They thence proceeded with additional numbers, and augmented rage, to the monasteries of the Gray and Black Friars, which they entirely pillaged and demolished. The Carthusians underwent the same fate.*

THE present inhabitants of Perth, who are of the established church, have three churches; there is likewise a Gaelic chapel, and a relief church. Among the dissenters are a small congregation of old Scotch Episcopalians: an English episcopal chapel: a small society of Cameronians; another of Anabaptists; a congregation of Burgher, and another of Antiburgher seceders, and a society of Glassites, or Sandemanians.

FROM the town we were conducted by Mr. Young along a fine zig-zag walk, to the top of the hill of Kinnoul, which has a gentle ascent on the south and east side, but the west is perpendicular, like many similar hills in Scotland, some of which will afterwards be particularly noticed. On the side of this hill Mr. Young is building a very good house, which is delightfully situated, and commands a fine prospect.

* See Hume's History, and Newte's Tour.

THE view from the top of Kinnoul hill is delightful, and very extensive: before us lay stretched out the Carse of Gowrie, a very fertile plain, rich in corn, and adorned with many noblemen's and gentlemen's seats. This beautiful plain is twenty miles in length, and, on an average, about three in breadth. Through this vale, the majestic Tay rolls along its waters, enlivened by the sails bearing the produce of different parts to Perth, and carrying its fish and manufactures in return. This river, though it does not assume the name of Tay till it issues from Loch Tay, has its origin at a much greater distance. It rises in Breadalbane, on the frontiers of Lorn, in Argyleshire. Before it has advanced many miles from its source, its stream becomes considerably augmented by several brooks that fall into it from the neighbouring hills. It soon after diffuses its waters into a small lake, called Loch Dochart; and indeed the river itself is here called the Dochart.* Issuing from this lake, it soon expands into another; out of this it proceeds to Killin, where, meeting with another river from the north-east, their waters form Loch Tay. Issuing from this beautiful and spacious lake at Kenmore, the Tay, as has been before observed, soon unites with the Lyon: at Logierait it is joined by the waters of the Tummel. Here it turns southward, and, passing Dunkeld, bends its course towards Perth; being, as it advances, still augmented by the accession of various tributary streams. A little below Perth it turns to the south-east, and receiving, as it proceeds, the waters of the Earn, it soon after expands to the

* Heron's Journey through Part of Scotland.

breadth of three miles. It contracts, however, as it approaches Dundee, where it pours its waters into the German ocean.

WHEN Agricola and his army first saw this noble river, and the adjacent plain on which Perth is situated, they cried out with one consent, *Ecce Tiber! Ecce Campus martius!*

OPPOSITE to the hill of Kinnoul, on the other side of the Tay, is another hill about the same height, or higher, called Moncrief hill; the prospect from which, Mr. Pennant says, is the glory of Scotland. It is nearly the same as from the hill of Kinnoul, but more extensive.

HAVING employed every instant of the morning in viewing the town, and surrounding country, and collecting what information we could from Mr. Young, who politely accompanied us in our excursions, we dined with JAMES PATTON, Esquire, where we met a very pleasant and intelligent party. As we did not wish to lose so fine an evening, after tea we went to visit the celebrated palace of Scone, which is about two miles distant from Perth. This place is interesting, as being anciently the residence of the Scottish kings, the place of their coronation, and the scene of many splendid actions. Here formerly stood an abbey, which was founded by Alexander I. in the year 1114, and dedicated by him to the Holy Trinity, and St. Michael the Archangel. It is said to have been originally a seat of the Culdees, and was afterwards filled with canons of St. Augustine. At the Reformation, a mob from Dundee and Perth,

rendered furious by the preaching of Knox, and impelled by private resentment, as well as the hope of plunder, destroyed both this ancient abbey and palace, which were very extensive. The abbey wall, as appears from the foundations which have been dug up, inclosed at least twelve acres of ground.

LONG before the foundation of this abbey, Scone appears to have been a place of note. Some writers call it the ancient capital of the Picts; but it was certainly the chief seat of the kings of Scotland, as early as the time of Kenneth.

IN the church of this abbey was preserved the famous stone, which was said to have first served Jacob as his pillow, and was afterwards transported into Spain, where it was used as a seat of justice by Gethalus, a cotemporary with Moses. It afterwards found its way to Dunstaffnage, as has been before mentioned, and continued there as the coronation chair, till the reign of Kenneth II. who removed it to Scone, and on it every Scottish king was crowned, till the year 1296, when Edward I. took it to England, and it continues one of the appendages of royalty in Westminster Abbey. According to an ancient prophecy, wherever this stone was, there would also be the seat of empire; this prophecy is expressed in the following distich, and is said to have contributed to reconcile many bigots of the Scotch nation to the union :

Ni fallat fatum, Scoti, quocunque locatum

Invenient lapidem, regnare tenentur ibidem.

DESCRIPTION OF LORD STORMONT'S SEAT. 119

It is not certain whether the present house, which is a seat of Lord Stormont's, stands on any part of the foundation of the former palace, though there are some reasons for believing that it does. This house is pleasantly situated on an extensive lawn sloping gently to the Tay, and surrounded by fine plantations. It is in that style of building which prevailed about two centuries ago, and which is more remarkable for its strength than its elegance. It contains some large apartments, particularly a gallery on the east side, the length of which is a hundred and sixty feet, and the breadth only eighteen, so that it instantly appears very disproportioned. The ceiling is arched, and covered with painting. On one side is represented the hunting of a stag, in all its different stages; and on the other, the diversion of hawking, and hunting of the wild boar. James VI. appears in every scene, attended by the nobles of his court, many of the portraits of which were drawn from life. The spaces between the different scenes are filled up with family arms, fruit, flowers, and other ornaments. These paintings appear to have had considerable merit, but are now much defaced. This gallery, and some other apartments, particularly the audience chamber remain in their original state; but others have been modernized. Among these last, is a very handsome dining-room, and a drawing-room. In the former is a superb chimney-piece, on the upper part of which are the arms of Britain, and below, those of the family of Stormont. In this room are portraits of the present king and queen, as large as life, and in some of the other rooms there are several good portraits.

IN an apartment on the west side of the house, which is called the queen's room, is a bed of flowered crimson velvet, which is said to have been the work of the accomplished and unfortunate Mary, during her confinement in the castle of Lochleven. In a room off the north end of the gallery, is the canopy of state used by the Earl of Mansfield, when ambassador to the court of Versailles, which is now converted into a bed.

ABOUT seventy yards north of the house, is a small eminence, commonly called Boot-hill; and by several writers, *omnis terra*, or every man's land. The common tradition concerning this hill, is, that at the coronation of a king, every man who assisted, brought so much earth in his boots, that each person could see the king crowned, standing on his own land; and that, after the ceremony, they cast the earth out of their boots upon this hill, on which account it obtained the name of *omnis terra*. It seems, however, more probable, that Boot-hill is a corruption of Moot-hill, or the hill of meeting. The highlanders still call it *Tom-a-mhoid*, which signifies the hill where justice is administered.*

ON this hill, DAVID, the first viscount of Stormont, built an elegant parish-church, about the year 1624, which, a few years since, wanting considerable repairs, and being insufficient to accommodate the parishioners, was taken down, excepting the aisle, and a new church built in the village of Scone.

* Stat. Account of Scone.

ON the north wall of this aisle which remains, is a very fine marble monument, erected to the memory of the above-mentioned David, Viscount Stormont. It seems to have been intended for an altar-piece, and represents the inside of a chapel or oratory. In the middle is a statue of his lordship in armour, as large as life, kneeling on a cushion before an altar, on which is laid a book: he has the palms of his hands joined in the attitude of prayer. This statue, particularly the face and hands, is very finely executed, every vein is expressed, and the figure seems to breathe. On each side is a man in armour, somewhat smaller than the life, but of admirable workmanship, the heads of which absolutely appear as if alive. One is said to represent the Marquis of Tullibardine, and the other the Earl Mareschall. Above these are several emblematical figures; towards the top, the arms of the family, and over all an angel. The *tout ensemble*, as well as each particular part, is very fine. Above the head of the Viscount is the following inscription:

THE right honourable Sr. David Mvrray of Gospertie kny. Sonne to Sr. Anrdov Mvrray of Balvaird, his grandsⁿ brother to y^e Earle of Tvllibardine, his mother davghter to y^e Earle of Montrois, his gvidame of y^e father, davghter to y^e Lord Lindsay, his gvidame of the mother, davghter to y^e Earle Merschell, qvho for his good service done to King James VI. qvhom he faithfully served from his yovthe in many honor^{ble} imployments (from a cvp-bearer, M^r of his horses, comptroller of his rents, capitane of his Ma^{tes} garrd, one of his h^{ns} honorable privie counsel) was created Lord of Scone. He married Dame Elizabeth Betone, ane ancient Barrons davghter of Creicke. Died w^{ovt}

ishve, and left his estat to nevoy of Balvaird, and to dame Annaas Mvrray his neis, qvhome he married to ane brother of y^e Earle of Tvllibardine from q^m he first descended. He helped his other friends who enioyes y^e frvits of his labors ; his bvildings prvifs he was pollitiq. Good men knew he loved virtve, and malifactors y^t he maintined ivstice. He fovnded y^e hospitall, and bvilded y^e chorche. His sovle enioyes happines, & vnder y^e tombe bvilded by himself lyeth his bodie, expecting y^e ioyfvl resvrrrection..

ON the east wall is a handsome monument of blue and white marble, erected to the memory of Lady Stormont, first wife of the Earl of Mansfield ; on a pedestal in a marble niche, stands an urn of white marble, in which her heart is inclosed. On the pedestal is the following elegant inscription :

In hac Urna
Amati quod superest cordis
Deponi voluit conjux A. D. 1766.
Mutique amoris perpetuo memor
nunc demum addit suum. A. D. 1796.

And on a tablet under the urn,
Sacrum

Henricæ Fredericæ Stormont.
Filiæ Comitis de Bunau
Uxori Davidis vice com. de Stormont
Mag. Brit. ad aulam Cæsaream
legati.

Florens ætate, ingenio forma
omni laude insignis
omni virtute predata
sibi felicem

Amicis parentibus et miserrimo conjugii
Acerbissimam mortem obivit
Die Marti XVI. A. D. MDCCLXVI.

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W. H. W.

AUGUST 7th. Early in the morning I went to the foot of the perpendicular rock of Kinnoul, which was mentioned to me as a great mineralogical curiosity, though I could get no particular account of the nature of it, except that it contained a number of beautiful pebbles. I therefore wished particularly to examine it: for this purpose, having crossed the Tay by the bridge of Perth, instead of turning on the left, towards Scone, I took the road to the right, and walked along the banks of the Tay, which here forms a fine island. It was from an eminence opposite this island, that Mr. Watts drew the view of Perth here presented: the base of Kinnoul hill is seen on the right, with Mr. Young's house among the wood at the top. It was along the base of this hill, close to the edge of the water, where something like a road may be discerned in the view, that I went, and after walking about two miles, came to the bottom of the perpendicular cliff. In my way along the side of the hill, I observed several rude basaltic pillars, and some strata, or currents of crumbling lava, in which a few thin veins of chalcedony were discernible. The foot of the perpendicular rock stands upon a steep hill, or inclined plane, which is covered with the debris, or loose fragments of the rock, that are constantly falling off, particularly after frosts and heavy rains. The height of the summit of this rock, above the level of the Tay, is 632 feet.

THE greatest part of this rock consists of lava, in which different layers, or currents, are very evident. Some of it is very compact, but it is generally full of small cells, which have been

filled with air bubbles, and resemble exactly the cells in the slag of an iron foundry. This lava is generally of a grey colour, having a lilac tinge; some of it was put into a small crucible, and being placed in the fire of a blacksmith's forge, easily melted into a glass of a dark purple colour, inclining to black, which was so tenacious that it could be drawn into fine threads, and might undoubtedly be blown into bottles. Immense quantities of this lava are lying at the foot of the rock, which show clearly the volcanic or igneous origin of the hill.

It is difficult to enumerate the different substances which are found in this lava; they are more numerous and various, as well as curious and beautiful, than I ever met with in any one place; indeed, I suppose that so rich a field for the student of mineralogy could scarcely any where else be found. In about two hours I collected a much greater number of curious and beautiful specimens than I was able to carry; though I filled my pockets, and a large pocket-handkerchief. I was under the necessity, therefore, of requesting the assistance of a person who was working at a little distance. I shall only attempt to enumerate some of the most curious specimens which I found.

AMONG the debris at the bottom of the hill, are frequently found very fine agates, of the ribbon, fortification, and other figures. This rock has long been famous for these, though the mineralogy of it has otherwise been little attended to. Several years ago a lapidary from Edinburgh visited it, and collected all

the fine agates he could find; since that time, a person in Perth makes a business of picking them up after every frost or heavy fall of rain; on this account, though I found several, none were remarkably fine. Sometimes they are found sticking in a bed of lava, and with a small pocket telescope I could perceive numbers of them, in the face of the rock, far above my reach, adhering in this manner.

I FOUND some of these pebbles hollow, the inside being lined with rock crystals, and I have one or two specimens in which calcareous crystals are inclosed in the middle of the agate; one incloses a piece of lava, which is a very curious circumstance. Besides these, nodules and veins of fine chalcedony are to be found, in some specimens resembling onyx, and in others approaching in appearance to carnelion.

IN some of the currents of lava I found veins of sulphat of barytes: there are likewise masses of amorphous sulphat of barytes, or cawk. The same mineral is also found in lenticular crystals, or what is called coxcomb spar. I found likewise some specimens of tuberos zeolite, and I have one in which a piece of lava is nearly invested with this mineral. I met with a considerable quantity of chert, or petrosilex, and found a large piece of rock crystal, incrustated with chalcedony, which is rough and opaque on the outside. This specimen contains within it a great number of crystals, if they may be so called, but they have a great resemblance to basaltic pillars, being pentagonal, and each face touching the other. They seem to have been formed by

the contraction of the parts, like pieces of starch, and are exactly similar to the pieces of unannealed glass called proofs, when broken by a piece of flint dropped into them. Rhomboidal calcareous spar is likewise met with, and greenish coloured steatite.

THAT the origin of this curious rock is igneous, cannot be doubted, from the greatest part of it being lava; but how these beautiful agates, or other minerals, have been produced, is perhaps difficult to say. Most of them, however, appear to have been formed after the flowing of the lava, and I think it most probable that the nodules of agate have been produced by crystallization in the air-holes of the lava, while it was in a fused state, in which state it would continue for a long time, at such a depth from the surface. One specimen which I have of a nodule of agate inclosing a piece of cellular lava in its centre, exactly of the same kind with that which surrounds it, strongly supports this idea.*

* Since this was written, I have seen the description of this rock by Faujas de St. Fond, who examined it with great attention when at Perth. As no person whatever has paid so much attention to volcanic mineralogy, I trust that my mineralogical reader will require no apology from me for transcribing his description of the various minerals which he met with. I wish to make my book as complete a guide as possible to tourists of every description.

Volcanic Mineralogy of Kinnoul.

1. Black basaltes, of a fine grain and homogeneous texture, forming an extensive current, adhering to a stream of black porphyric lava, with a basis of trap, and so disposed as to leave no doubt that the basaltic lava in this state derives its origin from

THIS lava having flowed externally, the formation of basaltic pillars has been prevented; at least those pillars that are met with are very rude; though there is a considerable quantity of

porphyric lava. The latter has preserved its crystals of feldspar, which are small but well defined, whilst the basaltic lava has lost its crystals, which are amalgamated and blended with the very basis of the porphyry, either by a sudden and violent, or by a long continued heat. On examining the basaltic lava with a microscope, small crystals are still seen in some parts of it, which are not entirely amalgamated with the lava; their course may be pretty well traced, even from their exterior appearance. Small splinters of porphyric lava, on being urged with a blow-pipe, afford an enamel of a beautiful black colour, and the basaltic lava yields a vitreous matter, in every respect similar.

2. The same basaltic lava, divided into prisms, very irregular, though well defined. These prisms present nothing in the fracture but an homogeneous lava, without the least crystal of feldspar.

3. Basaltic lava of a delicate green colour, very hard, sometimes sonorous on being struck, disposed in a large current. This greenish lava transversely intersects a current of black compact lava. Its greenish colour is owing to a particular modification of iron.

4. A quadrangular prism, well defined, in excellent preservation, and of an agreeable delicate green colour. I found it among the wreck of a considerable mass of lava of the same colour, which had fallen from the top of the precipice.

5. The same greenish basaltic lava, in a tabular form—none of the green coloured lavas were magnetic.

6. Compact porphyric lava, of a black ground, studded with a number of crystals of white feldspar, which have not undergone any alteration. This lava is strongly magnetic.

7. A quadrangular prism of blackish porphyric lava, magnetic, with a knob of flesh-coloured agate on one of its faces.

8. Porphyric lava, mouldering into gravel, and forming extensive beds. I have no doubt that if this gravelly lava, which is not very hard, were reduced to powder by the aid of stamping mills, like those used in Holland, for pounding the lavas, or taras, in the environs of Andernach, it would afford a puzzolana, an excellent cement, of great, and indeed indispensable use for building in water.

9. Compact porphyric lava, with a ground of deep iron grey, inclining to violet, intermixed with particles of green steatites, some knobs of variegated agate, and a few globules of white calcareous spar, disposed in a large current.

whinstone on the other side of the rock, near Mr. Young's house, where the lava has cooled more slowly.

To the botanist, the hill of Kinnoul is not destitute of attractions. I was struck with the appearance of a great quantity

10. Compact porphyric lava, magnetic, with knobs of white, and sometimes flesh-coloured calcareous spar, and globules of the finest green-coloured steatites.

11. Reddish-coloured compact porphyric lava, forming a layer between two currents of basaltic lava, of a delicate green colour, adhering to them.

12. Black porphyric lava, magnetic, intersected with belts of red porphyric lava, resembling the red porphyry of the ancients. This specimen, in which both the lavas are united, is very remarkable.

13. A geode of agate, internally studded with shining crystals of violet-coloured quartz, in the form of hexagonal pyramids, incrustated with compact porphyric lava, of a dark brown colour, a little inclining to violet, with some knobs of white calcareous spar, and several globules of agate and green steatites.

14. A geode of bright red agate, having in its interior a brilliant crystallization of white quartz, of greatest purity. This geode is found in black porphyric lava, which is magnetic.

15. Eye-spotted agate of a delicate rose-colour, incrustated with dark brown porphyric lava, intermixed with globules of green steatites. This specimen is very agreeable to the eye.

16. Red-striped agate, inclosed in black porphyric lava, strongly magnetic.

17. Semi-transparent agate of the most vivid red, in a porphyric lava inclining to violet, with knobs of white calcareous spar, and globules of a delicate green-coloured steatites.

18. A geode with a crust of chalcedoneous blueish oculated agate, internally studded with crystals of sparkling quartz. In the interior of the crystals, are seen pieces of black lava, taken up during the process of crystallization; which shews beyond a doubt, that the formation of the geodes was posterior to that of the lava.

19. A lump of white calcareous spar, sparkling, disposed in rhomboidal laminæ, amidst a slight envelope of steatites of a fine green colour. The whole is incrustated in a black compact lava, magnetic, and more nearly resembling basaltes than porphyry.

20. A lump of green steatites, enveloped with a slight covering of white calcareous spar, in a porphyric lava, of a brown colour, inclining to violet. This fragment is the reverse of the preceding.

St. Fond's Travels through England and Scotland.

of the *Cynoglossum officinale*, or great hound's tongue, among the debris of lava, at the bottom of the precipice, raising its mulberry-coloured blossoms above the pieces of broken rock. This led me to examine the vegetable productions more narrowly, and on the side and top of the hill I found the following plants, none of which are very common: *Asplenium Ceterach*, or common spleen wort; *Allium vineale*, or crow garlic; *Veronica saxatilis*, or rock speedwell; and *Potentilla argentea*, or silver cinque-foil.

AFTER dining at Perth, we set out for Kinross, distant fifteen miles on the Edinburgh road. The first part of our road was extremely pleasant; on our left we had the Tay, adorned with islands, and a fine view of the rock of Kinnoul: before us were the hills of Stormont and Moncrief. At the distance of about three miles from Perth, we crossed the Earne, a river which runs from a lake of the same name, and here falls into the Tay. At this place we left the road, and turned to the right, up the valley called Strath-Earne, to visit the mineral springs at Pitkeathly, which are about a mile and a half distant from the bridge of Earne. We were informed, at Perth, that these springs were chalybeate; and, if I remember right, they are mentioned as such in some late tours, but on examination they did not afford any appearance of iron.

THERE are five distinct springs, all of the same quality, but of different degrees of strength. With a view of acquiring some

knowledge of the contents of these waters, I made the following experiments :

1. Eight drops of tincture of galls being dropped into a wine-glass full of the water, produced no change in the colour, or transparency.
2. Acid of sugar produced only a very slight cloud.
3. Nitrat of silver produced a very dense cloud, which instantly fell to the bottom.
4. Muriat of barytes caused a slight turbidness.

IT would appear, from these experiments, that the water contains no iron, but little sulphuric acid, and only a small quantity of lime; but its taste, and the precipitation caused by nitrat of silver, indicate a considerable quantity of *muriat of soda*, or common salt. The water has no sparkling appearance when poured out of one glass into another, and no perceptible odour.

THESE were the only experiments which I could make on the spot, having only a few tests with me; but it was my intention to have procured a quantity of the water, and made a complete analysis of it at Glasgow. On looking, however, into the statistical account of the parish of Dumbarny, in which these wells are situated, I found this had been done, in a manner apparently very accurate, by Mr. STODDART, a chemist at

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Perth. I was not displeas'd at being sav'd so much trouble, and shall take the liberty to copy his analysis.

A TABLE, shewing the contents, in a wine gallon, of each of the mineral waters belonging to the estates of Pitkeathly and Dumbarny :

NAMES of the WATERS.	East Well.	West Well.	Spout Well.	Dumbarny Well.	S. Park Well.	
Atmospheric air - - - -	4	4	4	4	4	} cubic inches.
Carbonic acid gas - - -	8	8	6	5	5	
Carbonat of lime - - -	5	5½	5	5½	5	grains.
Sulphat of lime - - - -	5½	5	3½	3	3	Do.
Muriat of soda - - - -	100	92	82	57	44	Do.
Muriat of lime - - - -	180	168	146	102	84	Do.
Specific gravity of a gallon of each, more than distilled water	216	198	172	124	198	grains.

THE chief mineralizers are therefore muriat of soda, and muriat of lime.

THE time when these mineral waters were discovered is not known. In the year 1772, some experiments were made on one of the springs by Dr. DONALD MONRO, which, with a letter from the late Dr. WOOD, of Perth, were published in the sixty-second volume of the Philosophical Transactions.

THIS water, in its saline contents, bears a considerable resemblance to the purgative waters of Harrowgate, and is, like those waters, purgative when drank in rather a larger dose. It has long been celebrated, and I believe deservedly, in scrofulous and herpetic complaints; in the former it should be used internally as an alterative, rather than as a purgative, and should therefore be drank in small doses several times a day. In different herpetic complaints, or those which are commonly, though improperly, termed scorbutic, it should be taken in general as a purgative, either every morning, or every other morning, and used as a warm bath three or four times a week. This should be done in the evening, and the patient ought, during the night, to encourage a gentle perspiration; that circumstance being of much consequence in diseases of the skin. There is one house which can accommodate about half a dozen persons, near the wells; and there are several others in the neighbourhood, where comfortable lodgings may be had. The situation is very pleasant, and the air pure.

HAVING examined these mineral waters, we returned by the same road to the bridge of Earne, and then pursued our route to Kinross. At the distance of about seven miles from Perth, we ascended a hill, from which we had a delightful view of Strath Tay as far as Dundee; and of the fertile country of Strath Earne, through which that river meanders beautifully, till it reaches the Tay: this vale is adorned with the seats of several noblemen and gentlemen.

WE now left this rich and beautiful country for one much more barren, which contained nothing interesting. About a mile and a half before we reached Kinross, we passed through a considerable village called Milnathort.

KINROSS, * the capital of the county of the same name, is a small town, situated very pleasantly on a pretty extensive plain, at the west end of Lochleven. The great road from Edinburgh to Perth, by Queensferry, passes through it. This place used formerly to be famed for its cutlery manufacture; about forty years ago, this branch employed about thirty hands; but it has declined since that time, and is now little known. It has been succeeded by the linen and cotton manufactures. The principal manufacture is what is called Silesia linens; but some branches of the muslin trade have been introduced by manufacturers in Glasgow. There are two very good inns, one in the town, and the other about half a mile northward, on the Perth road.

AT a short distance from the town is Kinross-house, which was built by the celebrated architect, Sir WILLIAM BRUCE, in the year 1685, for his own residence. It is a very handsome building, containing some spacious rooms, and commands a delightful view of the lake, on the western bank of which it stands. It is now the property of Mr. Graham.

* Kinross, in the Celtic, signifies the head of the peninsula; and it is said that the whole tract of country between the Tay and the Forth had anciently the name of Ross, or Peninsula.—Stat. Account of Kinross.

LOCHLEVEN, which was the principal object of this journey, is a very fine piece of water; and though inferior in magnitude and grandeur to Loch Lomond, and many other lakes we had seen in our tour, it is by no means destitute of beauties of the more soft and gentle kind. It is about four miles in length from the west to the east end, and nearly of the same breadth; its circumference is about twelve miles.

THIS lake is bounded by the hills called the Lomonds, on the east, Benarty on the south, and by the plain of Kinross on the north and west. Four islands are dispersed in this expanse of water, on one of which are the ruins of a castle formerly belonging to the Douglasses of Lochleven, and which is generally called the castle of Lochleven. This island is about two acres in extent, and the castle stands near the middle of it, encompassed by a rampart of stone. This castle, with the adjacent country, forms a beautifully picturesque scene. When viewed from near the burial ground, beyond the house of Kinross, the island, with its ruined towers and trees, seems floating in the lake; between it and the shore are two small islands, called Paddock bower and Reed bower; the back ground is formed of rugged hills, sloping into the lake.

THOSE who are fortunate enough to view this scene, under the same circumstances that we did, will confess that it is one of the most tranquil, simple, and beautiful views that can be imagined. The day had been uncommonly warm, which made us



Drawn by Wm. Wood.

Engraved by Wm. Green.

Little Town?

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enjoy the sweet composure of the cool evening. Instead of the strong light of noon, a soft mellow hue overspread the whole scene, and gave it a charm so irresistible, that we both involuntarily exclaimed we had never been so much pleased with a view. Mr. Gilpin saw it under similar circumstances, and seemed equally enraptured with it.

A GREAT number of cranes, or herons, were seen on the island, and the ruins of the castle appeared almost covered with them, when we viewed it through a telescope.

THIS castle is said to have been the ancient seat of Congal, son of Dongart, king of the Picts, who built it. It was granted by Robert III. to Douglas, laird of Lochleven. It was formerly a very strong place, and could accommodate a numerous garrison. The contrast between its ancient splendour, and its present state, is beautifully painted by a bard, who drew his first breath, and spent the greatest part of his short life, on the banks of Lochleven.*

* Michael Bruce, the person alluded to, was born at Kinneswood, near Lochleven, March 27, 1746. He was descended from a family in no respect illustrious, though bearing a name renowned in Scottish history. His father was a weaver, reputable for his piety, industry, and integrity; and his mother was distinguished chiefly by her exemplary prudence and frugality, and the innocence and simplicity of her manners.

Let not ambition mock their useful toil,
Their homely joys and destiny obscure;
Nor grandeur hear, with a disdainful smile,
These short and simple annals of the poor.

They had eight children, of whom Michael was the fifth. The first years of his life were by no means passed without distinction; he very early gave proofs of a

No more its arches echo to the noise
 Of joy and festive mirth. No more the glance
 Of blazing taper through its windows beams,
 And quivers on the undulating wave :
 But naked stand the melancholy walls,
 Lash'd by the wint'ry tempests, cold and bleak,
 That whistle mournful through the empty halls,
 And piecemeal crumble down the tow'rs to dust.

superior genius, which his parents endeavoured to encourage and improve by education, as much as was in their power. He was designed for the church, and went through a regular course of studies in the University of Edinburgh ; but not succeeding, probably for want of patronage, he for some years taught a small school at Gairney Bridge, the foot of Lochleven ; the delightful scenery inspired his muse, and he produced several beautiful poems. His constitution was always delicate, and he was soon attacked by consumptive symptoms, which afflicted him for a long time, and carried him off in the twenty-first year of his age. His principal poems are Lochleven, Daphnis, and the Mousiad : besides these he left a number of elegies, odes, and pastorals, which were published after his death, by subscription, for the benefit of his mother. In the thirty-sixth number of *The Mirror*, is an essay on the subject of Bruce's poems, written, I believe, by Lord Craig. "Nothing," he observes, "has more the power of awakening benevolence, than the consideration of genius thus depressed by situation, suffered to pine in obscurity, and sometimes, as in the case of this unfortunate young man, to perish, it may be, for want of those comforts and conveniences which might have fostered a delicacy of frame or of mind, ill calculated to bear the hardships which poverty lays on both. For my part (continues he) I never pass the place (a little hamlet skirted with a circle of old ash trees, about three miles on this side Kinross) where Michael Bruce resided ; I never look on his dwelling—a small thatched house, distinguished from the cottages of the other inhabitants, only by a sashed window at the end instead of a lattice, fringed with a honeysuckle plant which the poor youth had trained around it ;—I never find myself in that spot, but I stop my horse involuntarily ; and looking on the window, which the honeysuckle has now almost covered, in the dream of the moment I picture out a figure for the gentle tenant of the mansion ; I wish, and my heart swells while I do so, that he were alive, and that I were a great man to have the luxury of visiting him there, and bidding him be happy."

Perhaps in some lone, dreary, desert tower,
That time has spared, forth from the window looks,
Half hid in grass, the solitary fox ;
While from above, the owl, musician dire!
Screams hideous, harsh, and grating to the ear.
Equal in age, and sharers of its fate,
A row of moss-grown trees around it stand ;
Scarce here and there upon their blasted tops
A shrivelled leaf distinguishes the year.

IN the year 1335, this castle sustained a memorable siege, by Sir John Stirling, one of the partisans, and a principal officer of Edward Baliol, who, under the protection of Edward III. of England, contested the crown of Scotland with David II. After the assailants had several times attempted to take it by storm, and being as often repulsed, they adopted the plan of damming up the river that flows out of the lake, expecting thus to raise the water in it so high, as to drive the besieged from the fortres. The water continued to rise daily, and they thought themselves certain of succeeding ; when a great feast in honour of St. Margaret being about to be celebrated at Dumfermling, the English General, and most of the troops, left the camp to assist at the festival. The besieged seized the favourable opportunity, collected all the boats they could find, and broke down the dam ; on which the water rushed out with such impetuosity, as to overwhelm the camp of the besiegers, and throw them into the utmost confusion. The besieged returned to the

castle in triumph, and were no more disturbed. At the end of the lake, where it empties itself into the Leven, are still to be distinguished some remains of this dam or mound.

THE circumstance, however, that renders this castle particularly conspicuous in Scottish history, is the confinement here of the accomplished but unfortunate Mary. After she was taken prisoner at Pinkie, in the year 1567, the confederate lords conveyed her privately from Holyrood-house by night, and shut her up in this castle, under the care of the mother of Murray, afterwards regent, who had been married to Douglas of Lochleven.

THIS woman, whose manners were as rude, as her conduct had been irregular, bore an implacable ill will to Mary, alleging that her own son was the true and legitimate heir to the crown. Under such a guardian the confederates knew she would be watched with care.

HERE she suffered all the miseries of a rigorous captivity, which she endeavoured to mitigate as well as she could, by practising those accomplishments she had learned in happier days, and which now afforded her a constant source of consolation: here it is supposed she composed and sung to the lute, some of those effusions of lyric poetry, which have been attributed to her.

NOT content with depriving her of her liberty, they forced her, by threats and promises, to sign an instrument, acknow-

ledging her resignation of the crown, and appointing Murray, a person she hated, as regent. When she subscribed this deed, she was bathed in tears; and while she gave away, as it were with her own hands, the sceptre she had swayed so long, she felt a pang of grief and indignation, perhaps one of the severest that can touch the human heart.*

IN this secluded fortress she languished for months, and seemed almost forgotten, till the haughty conduct of the regent estranged from him many of the confederates, and the length and rigour of her imprisonment had moved many to compassion; so that her few friends who had been dispersed, began again to gather and unite, and were daily increasing, when she recovered her liberty in a manner no less surprising to them, than unexpected by her enemies.

SEVERAL attempts had been made to rescue her, which the vigilance of her keepers had rendered abortive; but neither the walls nor bolts of the fortress were barriers against love. Mary had those bewitching charms which always raised her friends. These charms she employed to captivate the heart of George Douglas, her keeper's brother, a youth of eighteen. She treated him with the most flattering distinction, and even allowed him to entertain the most ambitious hopes. Thus circumstanced, was it possible for a youth like him to resist such a temptation? He yielded, and drew others into the plot. On

* Robertson, Book V. and Keith, 425.

in the same manner, by an opening in the rock beneath its surface, into another, which is larger than either of them, the diameter of it being twenty-two feet. The water in this cavity is not agitated as in the others, but is calm and placid. From this cavern the water rushes perpendicularly over the rock, into a deep and romantic glen, forming a fine cascade, particularly when viewed from the bottom of the glen, to which there is access by a zig-zag path.

THIS cascade is forty-four feet in height, and the rocks which compose the linn are about twice as high, so that it appears as if the water had worn its way from the top to its present situation, which most probably has been the case. It falls in one unbroken sheet, without touching the rock, and the whiteness of the dashing water is finely opposed to the almost black colour of the rocks, which are formed of coarse grained basaltes. While we were contemplating this beautiful scene, the sun happened to shine upon it, and the spray which arises from it to a considerable height, by refracting the rays of light, exhibited the appearance of a luminous vapour, in which the different prismatic colours were easily discernible.

A FEW years ago, the following curious circumstance happened here. A pack of hounds were eagerly pursuing a fox: the animal led them along the banks of the Dovan, till he came to the boiling caldron; there he crossed; but the dogs, in attempting to follow him, and not being probably so well ac-

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Drawn by W.H. Wood

Engraved by Wm Green

Rumbling Bridge.

quainted with the path, fell one after another into the caldron, and were dashed to pieces against the sides. This fact contributed not a little to confirm the reputation of Reynard for cunning and sagacity, in the minds of the spectators.

LEAVING the caldron linn, we walked about a mile, or rather more, up the banks of the Dovan, and came to another linn, or ravine, over which an arch is thrown. The rocks on each side approach so near, that an arch of twenty-two feet span is sufficient to form a communication between the different banks of the river, but the depth from the bridge to the water is no less than eighty-six feet; and the want of a parapet prevents even the steadiest head from looking down this frightful chasm without a degree of terror. The water both above and below the bridge rushing from rock to rock, and forming a number of little falls, produces a constant rumbling kind of noise, which is much increased when the water is swoln by rains: on this account the common people call it the Rumbling Bridge.

WHEN this bridge is viewed from the river below, it is a very sublime object. The sides of the chasm are formed by bold irregular rocks, consisting of a kind of pudding-stone, which are in many places finely covered with brushwood: above the bridge the water is seen running along, in some places concealed from the eye by the jutting rocks and foliage, and in others appearing again. In short, the whole forms a very romantic scene.

ABOUT 200 yards above the rumbling bridge, we came to another fall, though but a small one, with a kind of caldron, in which the water has the appearance of boiling. In this cavity, the water is continually tossed round with great violence, constantly dashing against the sides of the rock; this produces a noise somewhat similar to that made by a mill, and on this account it is called by the common people the Devil's Mill, because it pays no regard to Sunday, but works every day alike.

FROM the rumbling bridge, by a kind of winding path, not easy to discern, we came into the road from Kinross to Stirling. We by no means took the right road to see these curiosities, being misled by some very unintelligent persons. The best way is to keep the high road from Kinross to the bridge over the Dovan, then to turn to the left, and having rode about half a mile along a path at a little distance from the river, the traveller will be very near the rumbling bridge, to which he will be directed by some of the herds or peasants who may be within sight. He should then proceed down the banks of the river to the caldron linn on foot, the horses having been sent forward to a cottage adjoining a school-house on the road.

AFTER riding about five miles along a very indifferent road, we came to Dollar, a small village, with a wretched inn, where we dined. This place is equally distant from Stirling, Kinross, and Dumfermline, being twelve miles from each, consequently

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Drawn by W. Z. Wood

Castle Campbell

well situated for an inn, and it is a pity that there is not a house which would afford tolerable accommodation to travellers.

FROM a bridge over a small brook that runs through the village, is a fine view of the ruins of Castle Campbell, situated on the top of a round mound, which seems to have been partly formed by the hand of nature, and partly finished by art. On each side is a ravine, or glen, down which run streams that unite immediately below the castle, and form a considerable brook. The mound on which the castle stands is nearly perpendicular on the side next Dollar, and was formerly disjoined from the surrounding hills by a ditch, shelving down to the bottom of the glen on each side, which rendered the castle inaccessible, except by means of a drawbridge; so that it was formerly a place of very great strength. Though the castle stands upon an eminence, it is surrounded on all sides by higher hills, many of which are wooded to their summits, which gives to the whole scenery a very picturesque effect.

It is not known when or by whom this venerable pile of building was erected. It was formerly called the Castle of Gloom, a name very expressive of its situation; it is bounded by the glens of care, and washed by the burns of sorrow, for so the Celtic names of the glens and brooks are said to signify; but about the year 1493, when it probably first came into the possession of the noble family of Argyle, whose property it still is, it

was called Castle Campbell, by which name it has ever since been known.

THIS castle, with the whole territory belonging to the family of Argyle, suffered by the calamities of civil war in 1645; for the Marquis of Montrose, the enemy and rival of the house of Argyle, carried fire and sword through the whole estate. During this commotion, the castle was destroyed, and its magnificent ruins only remain, a sad monument of the horrors of the times. Not only the castle, but the whole of the parishes both of Dollar and Muckart, were burned, (the inhabitants being vassals of the family of Argyle,) excepting one house, which the followers of Montrose supposed to belong to the abbey of Dumfermline.

FROM Dollar to Stirling we found the road very good and pleasant, being carried all the way along the base of the Ochil hills, a range of high mountains that begin in the parish of Dumblane, east of Sherrifmuir, and stretch for many miles in an eastern direction into Fife. They are of a beautiful green, and afford excellent pasturage for sheep. They abound in minerals; and in several places have the appearance of an igneous origin: in many places quantities of fragments of lava have tumbled down their sides, among which, in the course of a very few minutes, I found several beautiful agate pebbles, containing rock crystals. Some were entirely filled with these crystals;

others were hollow, and lined with them in a most beautiful manner, many of them being of a fine violet or hyacinthine colour.

THESE hills contain likewise various metals, and seem to be rich in silver; but sufficient attention has not been paid to their mineralogy. I regretted much that my time would not allow me to examine them more particularly. In those parts of the hills lying in the parishes of Logie, Tillicoultry, Dollar, and Alva, veins of copper and lead have been wrought at different periods, to a considerable extent. I have some specimens of copper ore from this neighbourhood, which seem very rich; the gangue is sulphate of barytes, or cawk. Some time between the years 1710 and 1715, Sir John Erskine, of Alva, with the assistance of some miners from Leadhills, discovered a very rich vein of silver. It made its appearance in small threads, which being followed, led to a very large mass of ore; some of it was so rich, that twelve ounces of silver were obtained from fourteen ounces of the ore. A sum not greater than forty or fifty pounds had been expended, when this valuable discovery was made. During the space of thirteen or fourteen weeks, ore was produced to the value of £. 4,000 *per* week; and it has been said, that Sir John Erskine drew from £.40,000 to £.50,000, besides much ore which was supposed to have been purloined by the workmen. When this mass was exhausted, the silver ore began to appear in smaller quantities; and symptoms of lead and other metals were

discovered, on which all further search was given up.* I think it highly probable, however, that great quantities of this metal may exist in these hills. Cobalt has likewise been found in different parts, and particularly among the silver ore, in every respect equal to that brought from Saxony.

THERE have been various opinions respecting the etymology of Ochil; some have thought, that Ochills is a corruption of Oak-hills, there being considerable quantities of oak in this district: the common people do not however call these hills Ochills, but *Aichil-bills*, which is probably from the Celtic, meaning the wood hills, a *coill* in Gaelic signifying *the wood*. The whole extent of these hills presents a pleasing picture of rural scenery, and pastoral life. Gently swelling hills, verdant to their summits, covered with flocks of sheep, or herds of cattle; rivulets stealing through their defiles, or falling in hoarse murmurs from cliff to cliff; with hamlets and villages, sometimes skirted, and sometimes inclosed in woods.

WE had a view of Stirling long before we arrived there; it presented a striking resemblance to Edinburgh, though the view is certainly less grand.

* In the year 1767, Lord Alva, of some of the remains of this ore in his possession, caused a pair of communion cups to be made, for the use of the church of Alva, on which is engraved the following inscription:

Sacris, in Ecclesia S. Servani, apud Alveth, A. D. 1767, ex argento indigena, D. D. c. q. JACOBUS ERSKINE. (Stat. Account of Alva.)

St. Harding



Drawn by W. H. Miller.

Engraved by T. G. Green.

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AUGUST 9. As we arrived too late on the preceding evening to make any excursion, we determined to devote this day to see whatever was remarkable about Stirling. After breakfast we visited the castle, to which place we were politely accompanied by the Rev. Mr. Innes, chaplain to the garrison. This fortress is like that at Edinburgh, situated on the west end of a rock, which rises out of the plain, on the east side by a gentle elevation, terminating abruptly at the west. This rock is basaltic, being composed of pillars with five or six sides, though they cannot be compared with those of Staffa, in point of regularity; the joints are however in several places very evident. There are two or three basaltic rocks in the valley, within view of the castle, and there appears, as has been before observed, a chain of such abrupt elevations, all the way from the eastern ocean, on one of which the castle of Edinburgh stands, to that on the west, on which the fortress of Dumbarton is situated. These are commonly called the Lennox hills, and all rise by a gradual elevation on the east, are nearly perpendicular on the west, and in most of them basaltic columns are more or less discernible. Near Fintry, considerably to the west, is a rock in this chain called Dun, in which is a very superb range of basaltic columns. This range consists of seventy pillars in front, fifty feet in length; some of them are apparently without joints from top to bottom, while others contain several joints, and are easily separable into loose blocks. Some of these pillars are quadrangular, others hexagonal and pentagonal. On the east side of this range, the columns stand separated from one another, by an interstice of

three or four inches. On the west side the basalt does not assume a regular form, but ends gradually in a mass of cellular or honeycomb lava. In the parish of Strathblane, in the same range, are likewise to be found similar pillars, particularly one range, about 200 yards in length, where the pillars are from two to three feet in diameter, and thirty in length. But to return to Stirling.

THE castle has once been a place of considerable strength ; but such have been the improvements made in the art of war, that it could now scarcely hold out a few hours. About thirty-six guns are mounted on the ramparts.

IT was the favourite residence of the Scottish monarchs, and still exhibits very noble remains of royal magnificence. The palace is now converted into barracks ; its inside is totally without any form or regularity, but externally it is very richly and curiously ornamented with grotesque figures, upon singular pillars or pedestals, each of which is supported on the back of a figure lying on its breast, which appears a very painful position, especially when encumbered with such a load, and some of the figures seem to wish to be freed from it, if we may judge of the contortions of the muscles of their faces.

JAMES III. was very fond of this palace, and made it the chief place of his residence. He built a large hall for the assembly of his nobles, and parliament, which is still called the

parliament house ; this hall is 120 feet long, had a fine gallery, and was otherwise properly ornamented. It is now however stripped to the bare walls, and converted into a riding-school.

ADJOINING the parliament house, is the chapel royal, which was erected by Pope Alexander VI. It had considerable landed property, and was accounted the richest collegiate church in the kingdom. This chapel has undergone a similar reverse of fortune with the parliament house, being now converted into a store room and armoury.

THIS fortress was the place of the nativity of James II. and in it he perpetrated that atrocious deed which stains his character and reign, the murder of his kinsman, William Earl of Douglas, whom he stabbed with his own hand.* The room where this deed was committed, still goes by the name of Douglas's chamber. James V. was crowned here, and the unfortunate Mary likewise underwent the same ceremony at this place, on the 4th of September, 1543, in presence of the three estates of parliament, with great pomp and solemnity. From the time she assumed the reins of government, till her captivity, this place is mentioned in almost every page of her history, either as the place of her retirement from the insults of her subjects, or from its being the place of confinement of her friends. Almost the whole of the minority of James VI. under his tutor, the celebrated Buchanan, was spent here.

* If we may credit Buchanan, Douglas well deserved to suffer for his insolence and cruelty ; but it ought to have been in a different and more ignominious manner.

A STRONG battery was erected during the regency of Mary of Lorraine, about the year 1559, called the French battery. In the reign of Queen ANNE the castle was repaired, enlarged, and a flanking battery, called Queen Anne's battery, with a bomb proof, was erected on the south side; since this time, no alterations or repairs of any consequence have been made.

THE castle is commanded by a governor, deputy-governor, major, two lieutenants, and an ensign, and garrisoned by one hundred men.

UPON the rock, and near the castle, is a flat piece of ground inclosed, which was the place of the tournaments; on one side is a rock, where the ladies used to sit and observe the valour of the combatants; it is still called the ladies' rock.

As this castle was for many ages a principal fortress, we might expect to find that the surrounding country has often been the scene of bloody contention. Twelve fields of battle are pointed out from its walls, and of the four great actions fought by the two first Edwards, three were in its vicinity.

FROM the castle hill is a view inconceivably rich and beautiful, undoubtedly the finest in Scotland, and perhaps scarcely exceeded in any other country. It cannot indeed be called picturesque, being a bird's eye view, but is extremely rich and striking.

On the east is an extensive plain, near eighty miles in length and about eighteen in breadth, rich in corn, and adorned with wood. In this view is comprehended Alloa, Clackmannan, Falkirk, the Firth of Forth, and the whole country as far as Edinburgh. Through this valley the Forth winds in a manner scarcely to be described: it seems as if unwilling to leave the delightful country through which it runs, and as if wishing to prolong the time of its stay, by lengthening its course. Its meanders are so frequent and so large, as to form a great number of beautiful peninsulas, on one of which, just under the castle, stands the tower of the abbey of Cambuskenneth, the only remnant of the once magnificent pile, which was founded by David I. in 1147, and was one of the richest religious houses in Scotland. In the year 1559, the greatest part of this beautiful pile of building was destroyed by the reformers. Some idea of the windings of the Forth may be formed, when it is mentioned, that though the distance between Stirling and Alloa is only six miles by land, it is twenty by water. The Forth is navigable by vessels of seventy or eighty tons as far as Stirling; but, as Mr. Gilpin observes, if they were to trust to their sails alone, through the whole of this sinuous navigation, they must wait for the benefit of every wind round the compass two or three times over.

THE view on the north is bounded by the Ochil hills; and on the west is the rich vale of Monteath, bounded by rugged mountains, among which the summit of Benlomond is very conspicuous.

ON viewing the rich plain on the east, which is called the Carse of Stirling, every person must be struck with the idea that it has been formerly under water, and constituted a part of the estuary or Frith of Forth, but the river has gradually embanked itself, by the mud and sand which it has brought down from the mountains, and now meanders through the rich valley, contemplating its own workmanship. In proof of this it may be observed, that some years ago a complete boat was found near Falkirk, five fathoms deep in the clay, and anchors have been dug up in the ground between Stirling and Alloa. Oyster shells are likewise found in beds several feet below the surface of the earth, to the west of Stirling.

ON returning from the castle to the town, we passed the palace of the Earl of Argyle, or as it is generally called, Argyle's Lodging, on the left: this house is now converted into a boarding school. A little further, on the opposite side of the street, is the house of the Earl of Marr, which was begun in the year 1570, while Marr was regent of Scotland, but was never finished; it is said to have been built from the ruins of the abbey of Cambuskenneth. The outside is ornamented with the same kind of figures as the royal palace in the castle.

IN another of our excursions to the castle, we were conducted along a very pleasant walk, which has been carried from the town, round the castle, and in many places cut out of the solid rock; this walk affords several beautiful views, and gives an

excellent opportunity of inspecting the basaltic pillars of which the rock is composed. On a plain below we were shown several intrenchments, where, it is said, the king used to administer justice in the open air, being himself seated on a small mound in the midst, round which was an octagonal rampart, and ditch; on this rampart were seated the nobles, having a ditch surrounding them; without this stood the people, the whole having the appearance of a pyramid with a broad basis, like the British constitution.

THE town of Stirling, a great part of which is situated on the sloping part of the rock that supports the castle, is a place of considerable antiquity. It is very probable that it grew to its present size very soon after it became the temporary residence of royalty; and from the most accurate accounts, it appears to have undergone very little change, either in size, or the number of its inhabitants, for the last six hundred years, till lately,* when a manufacturing spirit having been introduced, a number of new buildings were erected. It contains about 5,000 inhabitants, and is certainly upon the increase since the introduction of the cotton manufacture, which has been carried on here for some years, with spirit and success. As far back as the sixteenth century, a considerable quantity of shalloons have been manufactured here, and though this manufacture is not, I believe, at present in an increasing state, yet not less than 200,000 yards of this article are annually made in the town and neighbourhood. There is

* See Stat. Account of Stirling.

likewise a flourishing carpet manufactory, employing about fifty looms.

• THE town is governed by a provost, four baillies, and a dean of guild, assisted by a town council, consisting of twenty-one members, fourteen of whom are merchants, and seven tradesmen, or mechanics. Besides the ordinary jurisdiction in civil causes, which is common to the magistrates of the royal boroughs, and the sheriffs of counties, the magistrates of this town have also a very extensive criminal jurisdiction, equal to that of sheriffs, within their territories.

THERE is a peculiar bye-law of this corporation, which the members of the council annually take an oath to observe, originating in a liberal and disinterested spirit, and which, from its salutary tendency, deserves to be followed by other corporations. By it they bind themselves to take no lease of any part of the public property, under their management, nor to purchase any part of it: neither to receive any gratification out of the public funds, under a pretence of a reward for their trouble, in going about the affairs of the borough. By this bye-law, a board of auditors is also elected annually, consisting of two members, chosen by the merchants at large, and two chosen in like manner by the seven royal incorporations.*

THE manner in which the old treasurer of the town used to keep his accounts, when writing was a more rare accomplish-

* Stat. Account of Stirling.

ment than at present, was sufficiently singular. He hung two boots, one on each side of the chimney; into one of them he put all the money which he drew, and into the other the receipts or vouchers, for the money which he paid away; and he balanced his accounts at the end of the year, by emptying his boots, and counting the money left in one, and paid away by the receipts in the other.*

THERE are two churches in Stirling, called from their situations the east and west churches; the former, which is the present place of worship, is a very fine building, and was erected by cardinal BEATON. The west church is of much older date, being erected, as it is said, in the time of Alexander III. or at least not later than 1494, when some have supposed it to have been built by James V. for the accommodation of some Franciscan friars, whom he brought into this country, and settled in a monastery or convent almost contiguous to the church.† It is a beautiful piece of architecture, but is now so much underground, and low-roofed, as not to be proper for a place of worship.

STIRLING has long been celebrated for its grammar school, which has sent into the world a number of celebrated men, and this place can boast of giving birth to some who have made a considerable figure in the literary world. Among these we may mention Dr. Robert Pollick, who was the first principal of the univer-

* History of Stirling, p. 98.

† Stat. Account of Stirling.

sity of Edinburgh, and a very celebrated writer of his age; Dr. Henry, author of the History of Britain; and Dr. Moore, well known as the author of Zeluco, and several other excellent works.

AUGUST 10. We this day went from Stirling to Callendar, distant sixteen miles. For the first mile our road was along the base of the rock on which the town and castle stand; we then entered the vale of Monteath, bounded by high hills, among which are Benvorlich on the * north, Benledi and Benlomond on the north-west. This vale is very fertile and beautiful, and watered by the Teath and Forth, which unite their streams about a mile and a half above Stirling. Crossing the Forth, the remainder of our road was along the banks of the Teath, or at no great distance from it.

At the distance of about six miles from Stirling, we passed Blair Drummond, the seat of Mr. Drummond Home, and formerly the occasional residence of his father, the enlightened and patriotic Lord Kaimes. The grounds are very extensive, and have been ornamented with great taste. Near the porter's lodge is a large water wheel, nearly on the principle of the Persian wheel; it raises sixty hogsheads of water from the Teath in a minute, which is conveyed by a canal to the moss of Kincardine, in order to wash this moss off the ground into the Forth. The construction of this water-wheel is very ingenious, but a particular description of it will, I think, be unnecessary here, as a very

* The height of Benvorlich above the level of the sea is 3,300 feet.

full account, both of the machine, and the operations on the moss, is given in the Encyclopædia Britannica.*

THIS moss originally covered near two thousand acres, three-fourths of which belongs to the estate of Blair Drummond, and is in the upper parts from six to twelve feet deep, and in the lower about three. It reposes upon a bed of clay, and the great object of the late and present proprietor, was to wash or float the moss from the surface of the clay, which has been done to a considerable extent, by conveying to the moss the waters of the Teath, in the way that has been mentioned. This water conveys the moss into the Forth, absolutely blackening its streams with the rich vegetable mould thus carried off. To accomplish this end, trenches are dug through the moss, into the clay, through which the water runs; into these trenches the labourers throw the moss, which is carried away to the Forth. In this way about 400 acres have been cleared and settled by a number of families of industrious Highlanders.

THIS Herculean labour, for so it may be truly termed, might, in my opinion, have been spared, and such an immense quantity of rich vegetable earth, as well as the dung in the stable of Augeas, might have been turned to much better use than by sending a river through it, to wash it off the ground.

* See Moss of Kincardine. There is likewise a full account of this wheel, and the operations carried on with respect to the moss, in the 21st vol. of Sir John Sinclair's Statistical Account.

It is now known, that the principal food of plants is carbon, of which this moss almost entirely consists, and though it is necessary that this carbon should become in some degree soluble, before it can be absorbed by the roots of plants, and converted into vegetable fibre, yet this solubility may be promoted by various processes; one of which is, by mixing it with gypsum (*sulphat of lime*) which acts very powerfully upon it, and converts it into most excellent manure. The use of this substance is not much known in this country, but in Germany and France it is much used. It is not ploughed into the ground like many other manures, but strewed upon the surface of grass land, which is to be taken into tillage, or intended for meadow, about the month of February; it speedily converts the old grass into a putrid state, and thus renders the carbon soluble, so as to be easily taken up by plants, and applied to their nourishment. The same substance, mixed with the surface of peat-moss, which has been formed by the successive decay of vegetable bodies, equally accelerates its putrefaction, and renders it fit for the nourishment of future vegetables.

BUT as a considerable quantity of this substance would be difficult to procure in this neighbourhood, there is another earth which may be easily obtained, and which answers the same purpose, this is lime; it quickly promotes the putrefaction of the vegetable matter with which it is mixed, and renders it fit for the nutriment of future vegetables. From the experiments made

by Mr. Smith* of Swindrig-muir, near Beith, in Ayrshire, it appears, that nothing more is necessary than to drain the moss, and afterwards to mix its upper surface with a quantity of fresh lime: this not only consolidates the surface in a surprising manner, but will produce the first year an excellent crop of potatoes, which will be more than sufficient to defray the whole expense of draining, liming, &c. After this, it will produce a succession of plentiful crops of grain, for a number of years, without any diminution. Indeed it is evident, that such a soil must be almost inexhaustible; for it consists entirely of carbon, the proper food of plants; and nothing more would be necessary than perhaps once in six or seven years, to mix a quantity of lime in order to accelerate the putrefaction, and consequent solution of the carbon; so that moss grounds, instead of being the most barren and unprofitable, might, by proper management, be made more fertile and productive than any other whatever. Vegetation is nothing but the conversion of carbon, hydrogen, and oxygen into trees and plants, by means of vegetable organization and irritability, so that if vegetables be supplied in proper quantity with the soluble carbonaceous principle, and water, they will flourish: so that the great business of agriculture may be resolved into two heads.

1. To supply the plants with proper food, or nutriment.
2. To supply that nutriment in proper quantity.

*A particular account of Mr. Smith's method of improving moss has been lately published, in the form of a small pamphlet, entitled, "An Account of the Improvement of Moss, &c. in a Letter to a Friend."

THE first is accomplished by the application of manures, the basis of which is carbon and water; the latter depends upon the soil in which the plants grow, being of such consistency as to transmit the nourishment in proper quantity.

SUCH is the effect of lime in consolidating moss, aided by draining, that though in Mr. Smith's experiments, before these operations, it would not bear a dog; often after the second, and always after the third year, it can be ploughed and harrowed by horses, and the crops taken off by carts; when about half a dozen crops have been taken, the surface is converted into a fine rich dark mould, which naturally runs into sweet luxuriant grass, and though before the moss is thus improved, it would not let for a penny the acre, yet after it has been laid down in grass, it is worth twenty-five or thirty shillings.

THE consolidation is so great, that at the end of five or six years, if it be laid down with grass, cattle may pasture without breaking or poaching it. As there is generally a superabundance of this vegetable earth in these mosses, part of it might be carried off, mixed with lime, and after a proper time, thrown upon other grounds, on which it would operate as an excellent manure.

THE potatoes produced from moss lands are said to be more free from blemish than any other, and are always preferred for planting again, to those grown on other soils. In Ireland, where

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by
Down Castle?

the cultivation of potatoes is well understood, they are generally planted in bogs or mosses.

THE draining and improving Trafford Moss, near Manchester, a very great undertaking, has been carried on for some years with great success by Mr. Wakefield, and Mr. Roscoe, of Liverpool. After draining it, marl is mixed with the surface, which promotes the solution of the carbon, by the calcareous earth which it contains, and the clay may probably assist it in consolidating the surface. A particular account of the operations on Trafford Moss may be seen in Aikin's description of the country round Manchester, which clearly shows that it is not necessary to wash the vegetable matter from the surface of the earth, in order to reach a surface of clay, of all others the most unfit for vegetation.

AT the distance of about eight miles from Stirling, and about two miles beyond Blair Drummond, we came to the village of Doune; here we crossed the Teath, and from the bridge had a beautiful view of the ruins of Doune Castle, delightfully situated on a kind of peninsula at the conflux of the Teath and Ardoch.

THIS castle has been a large square building, the walls being forty feet high, and ten in thickness. What remains of the tower in the north-east corner, is about eighty feet high. The north-west corner of the castle seems to have been the family

residence. The strong wall incloses a square, the side of which is ninety-six feet. The great gate stands on the north, and the iron gate and bolts still remain entire. There are several cells on the ground-floor, on each side of the entrance, which have probably been used as prisons. After entering the square, two outside stairs are seen, one of which leads into the tower, and the other into that part which has been inhabited by the family; this latter leads to a spacious lobby, which divides the kitchen from the great hall; this hall is sixty-three feet long, and twenty-four wide: the kitchen fire-place extends from one side of the room to the other, being supported by a strong arch, and remains a proof of the hospitality of the times. Indeed the whole of this side of the building has the appearance of grandeur and magnificence.

THE east stair leads up to the apartments in the tower; the first is a spacious room, with a large fire-place; this room communicates with the great hall at the north-west corner, and has probably been the family dining-room. There are several other large apartments in the upper stories. From the south-east corner of what is supposed to be the dining-room, a narrow stone stair descends, and leads, by a subterraneous passage, to a cell or dungeon, into which no light is admitted, except from a little room above, through a square hole in the roof of the cell, which has probably been left to prevent suffocation, and to let down the scanty pittance of the unhappy victim of the baron's displeasure.

THERE are no dates or traces which discover the time when this castle was built. From its structure it appears to have been very ancient. As it was the family seat of the Earls of Monteath, it was probably built while this powerful family had a share in the government; and as the Earldoms of Fife and Monteath were in separate families, till united in the person of Robert, son of King Robert II. of Scotland, the most probable conjecture is, that this magnificent building was erected by one of the Earls of Monteath, previous to the reign of this prince.

THE following historical sketch is taken from the statistical account of this parish :

THE first Earl of Monteath (Walter Cummin) was created by Malcolm III. in the year 1057, and this nobleman was afterwards appointed lord high steward of Scotland. This Walter was the grandson of Bancho, who was murdered by Macbeth; and having, with the assistance of Macduff (formerly Thane, now) Earl of Fife, quelled a rebellion that threatened Malcolm, and slain the leader of the rebels, the king immediately conferred this high dignity upon him.

IN ancient times, an officer was appointed in each district for collecting the king's revenues, and administering justice, who was called a Thane, and the superior officer over the whole, was called the Abthane. When the title of Earl was introduced by Malcolm in place of Thane, the lord high steward was in the oom of the Abthane.

FROM this Walter, lord high steward, descended the family of Stewarts, which reigned so long over Scotland; and though there undoubtedly was a Thane of Monteath before the time of Walter, yet the high dignity conferred on this nobleman, affords ample room to conjecture, that the magnificent castle of Doune was begun, and perhaps finished in his time. What strengthens this still more is, that Malcolm had four sons, Duncan II. Edgar, Alexander I. and David I. who reigned successively over Scotland during a period of eighty-seven years, cultivated the arts of peace, and afforded leisure for such an extensive building as the castle of Doune.

TRADITION however reports, that the castle of Doune was built by Murdac Duke of Albany, and Earl of Monteath and Fife. But however much we may be disposed to give credit to local tradition, yet the account of the life of this unfortunate nobleman, gives great room to doubt how far it was possible for him to rear such an edifice. At that time, no doubt, the power of such a nobleman was great, and having his vassals and dependants ready at his call, he could make a strong effort to erect a building in a short time; but such a building as Castle Doune would require several years.

MURDAC was the son of Robert, who was the son of Robert II. King of Scotland. Robert was created Earl of Monteath in 1370, and in 1398 he was created Duke of Albany. In 1406

he succeeded to the government on the death of his brother, Robert III. and reigned fifteen years.

In the year 1401, Murdac was taken prisoner by the English at the battle of Homelden, and detained till exchanged for Percy in 1411; and on the third of September, 1420, he succeeded his father in the government; but being of a sluggish disposition, and scarce fit to manage his own family, he was obliged to resign the government in four years; it is therefore reasonable to suppose, that he had neither time nor activity necessary for such an undertaking as the building of Doune castle.

THE misfortunes of this Murdac seem equal to his indolence; for after being a prisoner in a foreign country ten years, he led a retired life until the death of his father, when he entered on his short reign, and soon became overwhelmed with the load of state affairs. His resignation was suddenly followed by an accusation of high treason against him and his two sons, Walter and Alexander, and Duncan Earl of Lenox, his father-in-law, who were seized and carried prisoners to Stirling. Murdac was taken between Doune and Dumblane, at a small rivulet which is still called Murdac's Ford.

In the summer 1423, the prisoners were tried, condemned, and beheaded on one of the Govane hills, to the north of Stirling Castle. Isabella, Murdac's wife, being carried from Doune Castle to the castle of Tontallan in Lothian, the heads of her

father, husband, and children, were sent to her in prison, to try if, in the agony of grief, she would reveal the supposed treason; but her answer was noble and elevated. "If the crimes," says she, "objected were true, the king has done justly, and according to law." Murdac, his lady, and two sons, were buried on a small island in the lake of Monteath.

DURING these lamentable transactions, the castle of Doune, as well as Falkland, in Fife, were seized by the king, and remained annexed to the crown till the year 1502, when Margaret, the daughter of Henry VII. king of England, was married to James IV. king of Scotland, and had given her, by way of settlement, the castle of Doune, and certain lands in Monteath. After the death of James IV. she married Henry, Lord Methven, and descendant of Murdac, Duke of Albany. This marriage took place in the year 1528, and immediately afterwards, the queen, with the consent of her son James V. and her husband, Lord Methven, granted to James Stewart, a younger brother of her husband, and ancestor of the family of Moray, the custody of the castle of Doune for his life; and which right was afterwards extended to his heirs by James V. This office had been enjoyed by the family of Edmonstone of Duntreath, and occasioned a violent quarrel between the families, which ended, as quarrels often did in those times, in the assassination of James Stewart by Edmonstone. But James, the son of the above James Stewart, obtained possession of the castle, and was afterwards created Lord Doune by charter, in the year 1581. Since this period, the

castle has remained in the possession of the family of Moray without interruption.

THE village of Doune is not large, but is in a very improving state, and pleasantly situated. What has chiefly contributed to the increase and improvement of this place, is the introduction of the cotton manufacture. An extensive work, called the Adelphi Cotton Mill, was erected a few years ago, by some public spirited and enterprising brothers, the Buchannans, of Carston, on the south bank of the Teath, a little to the west of Doune, for the spinning of cotton yarn. This extensive work employs about 700 persons, for whose accommodation all the ruinous houses of Doune have been repaired or rebuilt. Mr. Murdoch, of Gortincaber, has likewise built a street of houses on the south side of the Teath, with a convenient garden to each. This, which is called the New Town of Doune, is chiefly inhabited by families employed at the cotton works. The workmen are paid according to the quantity and quality of their work, which makes them very industrious, as well as dexterous: some hands will earn two guineas a week.

FOR some time past, Doune has been noted for excellent slaters, who have aquired superior reputation in that branch over all the neighbouring country, particularly Glasgow and its vicinity, where they are often invited to contract for modern buildings, in preference to the slaters of other places. They work in these towns during summer, and the more industrious

among them learn other trades, such as shoe-making, weaving, &c. which they practise when the season will not admit of their slating.

DOUNE has likewise been long celebrated for the manufacture of highland pistols. This art was introduced here about the year 1646, by Thomas Cadell, who carried it to such great perfection, that no pistols made in Britain excelled, or perhaps equalled those of his making, either for sureness, strength, or beauty of workmanship. He instructed his children, and several apprentices, who carried on the business here with great reputation. While the ancient dress before described was common, there was a great demand for the Doune pistols, and presents of them were frequently sent by noblemen in this country to foreign princes; they were sold from four to twenty-four guineas a pair.* As the business has of late years declined, there is only one person now engaged in it, and it is likely that at his death it will become extinct.

FROM Doune we proceeded to Callander,† eight miles distant, where we arrived early enough in the evening to see whatever was remarkable at this place. It is a considerable village, situated on both sides of the Teath, and built on a regular plan; the houses are in general good, and covered with slate. In-

* Stat. Account.

† Callander is probably derived from the Celtic *Calidin-doir*, signifying the hazel grove; there being several groves or woods of hazels in the immediate vicinity of this village. (Stat. Account of Callander.)

cluding the soldiers settlement (which consists of houses built by government for pensioners, after the peace of Paris in 1763) the number of families in the village is 190, which, if we allow five persons to a family, gives the population at 950; we may however safely state it at 1,000, which is I believe under the truth. This village has increased greatly within the last thirty years, and will do still more so, on account of the introduction of the cotton manufacture. In the weaving of muslin, about a hundred looms are employed in Callander and the adjoining village Kilmahog, and about a hundred girls find employment in a tambour work.

THE church stands on one side of a kind of square, near the middle of the village: it has a pavilion roof, with a spire over the pediment, and is a considerable ornament to the place. A stupendous rock rises on the north of the village, which adds much to its picturesque appearance; this rock is covered with wood wherever there is any soil. It is entirely formed of pudding-stone, composed of rounded pebbles inclosed in a brown lava; it resembles very much the rocks near Oban, and has no doubt had a similar origin.

As it was our intention to visit Loch Catharine the next morning, we were advised by the people of the inn to procure a guide; which is scarcely necessary, there being no difficulty in finding the way, and we were imposed upon by the person who went with us in that capacity.

AUGUST 11. About seven o'clock in the morning we set out from Callander, along the banks of the Teath, and passed through the small village of Kilmahog; on our right we saw the house of Leney, the residence of John Hamilton Buchannan, Esquire, proprietor of that village, pleasantly situated on an eminence; here we crossed the Teath,* and skirting the southern limb of Benledi,† a high mountain on our right, we

* In this river, particularly about Callander, are considerable quantities of muscles, which some years ago afforded great profit to those who fished them, by the pearls they contained, which sold at high prices. Some of the country people made 100*l.* in a season by that employment. This lucrative fishery was however soon exhausted, and it will probably require a considerable time before it can be resumed with profit, because none but the old shells, which are crooked like a crescent, and which have undergone certain changes, produce pearls of any value. Faujas de St. Fond says, that no pearls are found unless the shells have been perforated by worms or other means, which lets the pearly juice exude, and forms modules of pearl; vide Buffon's Natural History of Minerals. When neither side of the shell has any cavity or perforation, but presents a surface smooth and free from callosities, pearls are never found in such shells, so that the formation of this beautiful animal product is merely an extravasation of pearly juice, in consequence of a puncture, and may be artificially produced.

They are fished with a kind of spear, consisting of a long shaft, and terminated by two iron spoons, forming a kind of forceps; the handles of these spoons are long and elastic, which keep the mouths closed, but they open upon being pressed against any thing: with this machine in his hand by way of staff, the fisher, being up to the chin in water, gropes with his feet for the muscles, which are fixed by one end in the mud and sand, he presses down the forceps, which opens and grasps the shell, and enables him to pull it to the surface. He has a net bag hanging by his side to carry the muscles till he comes ashore, where they are opened.

† Benledi is 3,009 feet in height above the level of the sea: its name is derived or contracted from *Ben-le-dia*, or the hill of God: according to tradition, the people of the adjacent country, to a great distance, assembled annually on its top, about the time of the summer solstice, during the Druidical priesthood, to worship the Deity. This devotional meeting is said to have continued three days. Stat. Account of Callander.

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Illustration by W.H. White

Drawn by W.H. White

Leopard

came to Lochvanachoir,* out of which the Teath runs, though its origin is properly in Loch Catharine.

LOCHVANACHOIR is nearly four miles in length, and in general about one in breadth ; its banks are very pleasant, covered with wood, and sloping gently into the water.

SOON after leaving this lake, we came to another, but smaller, called Lochachray.† The length of this lake is about a mile and a half, and its breadth scarce more than half a mile, but its banks are very pleasant, being covered with wood. The scenery at the upper part is remarkably bold and striking.

IT was here that we had the first view of the Trosachs,‡ which are rough, rugged, and uneven hills ; beyond these is seen the rugged mountain Benvenu, which differs in nothing from the Trosachs, except in magnitude.

As soon as we had passed Lochachray, we entered the Trosachs by a road winding among them. The scenery here is exceedingly wild and romantic ; rugged rocks of every shape surround the road, and in many places overhang it ; these rocks are

* Loch-van-a-choir signifies the lake of the white or fair valley.

† Lochachray is contracted from *Loch-a-cravy*, which signifies the lake of the field of devotion. Achray is the name of the farm on its banks, where it is believed the Druids had a place of worship, there being some remains of one of their temples, Stat. Account.

‡ Trosachs, or *Drosachs*, in the Celtic, signifies rough or uneven grounds.

almost covered with heath, and ornamented to the very top with weeping birch. This part of the road presents scenery which is wild and horrid ; it seemed to be Glencoe in miniature ; but the mountains, though vastly smaller, are more rugged, and being covered with heath and birch wood, have a different character.

I SHALL not enter into a further description of the Trosachs, for it is impossible by words to convey any idea of the kind of scenery. These hills had been described to me by several persons who had visited this place, and I had read some descriptions of them, but could form no distinct idea of what I was to see : as I have no pretensions to superior powers of this kind, I shall leave the task to Mr. Watts, whose pencil will give an exact representation of some part of this scenery.

THE Trosachs are composed of argillaceous schistus, stratified and imbedded here and there with veins of quartz. The strata are in some instances nearly perpendicular to the horizon, and in all dip very much,—a proof that some convulsions, or powerful causes, have removed these lumpish hills from their original situation. Some suppose them to have been torn from the sides of the adjacent mountains, but there are, I think, no appearances which warrant this conclusion.

AFTER we had followed the winding road which may be seen in the engraving, among these strange masses, for about three quarters of a mile, we had a sight of the lower part of Loch

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St. Catherine's

Catharine, winding its way among the Trosachs, some of which appear above its level surface in the form of bold and rugged islands and promontories. The scenery about this lake is uncommonly sublime, particularly when we had gone about a mile up the northern bank, where the road has been made with great labour, in many parts out of the solid rock, but which is impassable for a carriage, and can scarcely be travelled over on horseback with safety. Here, turning back our eyes towards the Trosachs, the view was particularly grand; rocky islands rise boldly out of the lake, and in the back ground is Benvenu, rearing its rugged summit far above the whole, having its lower part clothed with wood.

THE view up the lake to the westward is likewise very fine; the expanse of water being bounded by alpine mountains, softened by distance, and appearing of a fine dark blue.

LOCH CATHARINE is about ten miles in length, but not much more than one in breadth, and if it possess not the beauty of other lakes which we had seen, its scenery is much more grand and romantic.

NEAR the foot of the lake, the honourable Mrs. Drummond, of Perth, has erected some huts of wicker work, for the convenience of strangers who visit this wild scenery; here they can partake of the refreshments which they bring from Callander, and shelter themselves from a storm.

THE wood, which abounds on the banks of Loch Catharine, is made into charcoal, a certain portion being cut down annually, and when burnt, it is brought down to the foot of the lake in boats, from whence it is conveyed in carts to the Carron foundry. The *Circea Alpina*, or mountain enchanter's nightshade, grows in great abundance on the banks of this lake; the pebbles found on the shore are chiefly argillaceous and micaceous schistus, with some quartz.

LOCHVANACHOIR abounds both with salmon and trout, and Lochachray with pike, which prevents almost any other fish from living in its vicinity. In Loch Catharine are trout and char, but the salmon and pike are prevented from entering this lake, by a fall at its mouth.

THESE three lakes are only expansions of the beautiful river Teath, which may be said to originate in Loch Catharine, or more properly in the numerous streams that pour into this lake in cataracts from its steep and rugged banks.

AFTER having seen whatever was remarkable in the neighbourhood of Loch Catharine, we returned by the same road to Callander, and as it was our wish to make the best of our way to Glasgow, after dinner we took the cross road to Fintry, sixteen miles distant. About six miles from Callander, we came to the Loch of Monteath, a beautiful little lake about five miles in circumference, adorned with two small sylvan islands. On the

larger are the ruins of a monastery, and on the smaller the remains of an ancient seat of the once powerful Earls of Monteath, whose chief residence, as has been before observed, was Doune Castle.

THIS lake abounds with perch and pike, which last are very large. A curious method of catching this fish used to be practised. On the islands a number of geese were collected by the farmers, who occupied the surrounding banks of the lake. After baited lines of two or three feet in length had been tied to the legs of these geese, they were driven into the water. Steering naturally homeward in different directions, the bait was soon swallowed. A violent and often tedious struggle ensued, in which, however, the geese at length prevailed, though they were frequently much exhausted before they reached the shore.* This method of catching pike is not now used; but there are some old persons who remember to have seen it, and who were active promoters of this amusement.

AT the distance of about fifteen miles from Callander, we crossed the Endrick, which falls into Loch Lomond, and soon after came to Fintry, a very improving village, or rather two villages, an entire new town having been built at some distance from the old one, for the accommodation of the manufacturers, since the introduction of the cotton manufacture. The houses stand in a row on one side of the road, and are built according

* McNayr's Guide.

to a regular plan, each consisting of two stories and garrets. The situation is very pleasant and dry, and there are gardens belonging to the houses, in front, on the sloping banks of the Endrick, separated from the houses by the road.

ON the opposite side of the river is a large cotton mill, 156 feet in length, and 40 wide, which employs above a thousand hands.

AT a little distance from the village, at the end of the hill of Fintry, is to be seen the range of basaltic pillars before mentioned.*

AUGUST 12th. We left Fintry early in the morning, and crossed the high ridge of hills called Campsie Fells, to the village of Campsie, which is eight miles distant. These hills have the appearance of a volcanic or igneous origin; in many parts, rude basaltic pillars are to be seen, particularly on the side of the road which slopes down the hill above Campsie: in these hills very beautiful agates are sometimes found, as well as considerable quantities of chaledony.

THE highest ridge of the Campsie hills is 1,500 feet above the level of the sea, and 1,200 from its base. These hills have a very bleak and dreary appearance; but when we gain the summit, the valley of Campsie, which lies below, appears very rich and beautiful.

* See page 149.

THOUGH in many places these hills appear evidently of volcanic origin, yet in others they are stratified; but the strata dip very much, and are in many places almost perpendicular to the horizon, having, most probably, been raised from their naturally horizontal state, by the action of subterraneous fire. The secondary, or stratified mountains, abound with coal and lime, grit, ironstone, clay, and marl. In one place there are at least a dozen strata of ironstone of different thickness, separated by argillaceous schistus, which evince, that alternate depositions of these substances have taken place in a very curious manner.

IN several places there are appearances of copper, but no attempts to find any vein of this metal have yet been made. A few years ago, when the new road over the hills was making, some veins were cut through, containing cawk, or sulphat of barytes, with beautiful calcareous crystals, and some crystals of fluat of lime, very similar to those that are generally found in lead mines; indeed some practical miners have declared, that appearances of lead are very frequent in these hills; but no attempts have yet been made to pursue them. It is by no means improbable, however, that these stratified mountains, which have undergone such disturbance in the disposition of their strata by volcanic fires, which would cause numerous fissures, do really abound with metallic substances.

CAMPSIE, like Fintry, consists of two villages; the new one, which is increasing very rapidly, has been built since the intro-

duction of the cotton manufacture. Several branches of this manufacture are carried on with great spirit; here is likewise a very large cotton mill. Indeed this place possesses many advantages for carrying on manufactures; the soil is naturally dry, and streams of water for the purposes of bleaching, and driving machinery, are very numerous: the quantities of coal and lime may be said to be inexhaustible; and the country is completely intersected by good roads. Glasgow being only nine miles distant, affords a ready market both for the produce of the land and manufactures.

If we compare the present situation of the inhabitants of this part of the country, with certain periods either in the beginning or middle of this century, it will appear astonishingly improved. In the statistical account of the parish of Campsie, is given a table, containing the most remarkable facts relative to parish economics, taken at four different periods, which, as it will serve to show the progress of improvement, not only here, but in Fintry, Callander, Doune, Aberfeldie, and other places, where manufactures have been introduced, I shall take the liberty to transcribe.

YEAR 1714.

1. Only three cows said to have been killed in the whole parish for winter beef, gentry excepted.

2. The wages of a man servant for half a year 9*l.* Scots, or 15 shillings sterling; some of the best got 12*l.* Scots, or one pound sterling; a woman servant 6*l.* Scots, or 10 shillings, for half a year.
3. No wheaten bread eaten in the parish.
4. No inclosure whatever in the parish, except about gentlemen's gardens or woods.
5. No cart or chaise; the gentry rode to church on horseback.
6. All broad ploughs, the horses yoked abreast.
7. The men wore bonnets and plaids, with plaiding waistcoats, and plaiding hose; no English cloth whatever was worn by the inhabitants, the gentry excepted.

YEAR 1744.

1. The better sort of farmers joined, and got a cow for winter beef, betwixt two of them; the price being then only thirty-five or forty shillings for a fat cow.
2. No chaise was yet kept in the parish; some few carts, but these were only used to carry out manure in the spring; the wheels were not hooped with iron, and the moment the manure was carried out, these wooden wheels were taken down till the next spring.
3. Perhaps about five or six inclosures were made in the parish; and it must be owned, that these, though few, were substantially built; they remain entire and firm to this day.
4. No wheaten bread, nor English cloth used by the inhabitants.

5. A man servant's wages were from thirty shillings to two pounds per half year; a woman's from fifteen shillings to one pound sterling; men servants, at this period, uniformly got a pair of hose and shoes besides their fee.
6. No potatoes, carrots, or turnips, were used by the inhabitants, and only a few kail were planted in their yards for the pot.

YEAR 1759.

1. Carts became more numerous, there being about twenty in the parish which had their wheels hooped with iron.
2. The broad plough still continued in many places, though in general the horses were now yoked two and two; still there were no fanners for the mills or barns, the farmers being obliged to winnow their corn in the fields.
3. A man servant came now to receive fifty shillings, and three pounds sterling per half year; and a woman twenty-five or thirty shillings.
4. There were now two chaises in the parish, and English cloth began to be worn occasionally by the better sort of people, along with worsted stockings, and buckles in their shoes.
5. Potatoes were only cultivated in lazy beds.
6. Very decent farmers still thought it necessary to have some part of a fat cow, or a few sheep, salted up for winter store.
7. By the leases granted by the proprietors of the land at this time, the tenants were bound to inclose some part of the

farm; still there was no sown grass in the parish, and the cattle grazed promiscuously in the winter season.

8. There were no clocks in the parish, except in the houses of the gentry and principal inhabitants.

YEAR 1794.

1. There were nearly two hundred carts in the parish, perfectly equipped for any draught.
2. There were four post-chaises and three coaches, and one two-wheeled chaise, kept by the gentry in proper style.
3. The wages of a man servant were betwixt five and six pounds per half year; and a woman's from two to three pounds ditto.
4. Potatoes are now universally used by all ranks of people, for at least six months in the year.
5. Wheaten bread is now universally used by every description of people; there being two bakers at Campsie, besides some hundred pounds value of wheaten bread brought annually from Kirkintilloch and Glasgow.
6. There have been near three hundred fat cows killed annually about the Martinmas time, for winter provision, besides mutton, beef, and lamb killed through the season, by resident butchers.
7. Every lad now dresses in English cloth, and fancy waistcoats, with thread or cotton stockings; and every girl in cotton stuff, black silk cloaks, and fancy bonnets.

8. The quantity of liquor drank in seventeen public houses in this parish, must be very great indeed ; as I have been told that four and five pounds at a reckoning have been collected from a company of journeymen and apprentices on a pay night.
9. The houses of every decent inhabitant of this parish consist at least of a kitchen and one room, generally two rooms, ceiled above, and often laid with deal floors, with handsome glass windows ; and I believe few of the tradesmen, mechanics, or manufacturers, sit down to dinner without flesh meat on the table, and malt liquor to drink.

FROM Campsie we proceeded to Glasgow. It may perhaps be expected that I should give a particular account of this city, as I have done of Perth and other places through which we passed ; but this I shall not attempt for the following reasons :

IN the first place, to give only a concise account of the different public buildings, the state of commerce, manufactures, &c. would swell this work too much, and would occupy more time than I can at present spare from other avocations.

IN the next place, this is rendered perfectly unnecessary, by the history of this city, which has been lately published by Mr. Denholm, in which every part of it is particularly described, with accurate views of almost all the public buildings. A very good historical sketch of the rise and progress of the place, its po-

litical constitution, literary and charitable institutions, commerce and manufactures. As I take it for granted, that no person who visits this city will neglect to avail himself of this useful compendium, I shall be very brief on these subjects.

GLASGOW may, I think, without hesitation, be looked upon as the most improving place in Britain. In speaking thus, it is not intended to compare it with the British metropolis, for the difference of magnitude will preclude all comparison; but there is not another city or town in the British empire which is at present increasing so rapidly in population and opulence. Great numbers of new houses are built every year, yet so rapid is the influx of inhabitants, that it is with the greatest difficulty a tolerable house can be procured. I am credibly informed, that this present year, there are no less than five hundred new buildings erecting. It is almost unnecessary to remark, that in Scotland a single family does not in general inhabit a whole house from bottom to top, as in England, but that each story, or flat as it is called, is inhabited by a different family. Now, if we allow to each house only two families, which I am convinced is under the truth, and suppose the other flats to be occupied as shops and warehouses, these new houses will accommodate a thousand families, or five thousand inhabitants, allowing five persons to each family: yet notwithstanding this increase in the number of buildings, I question much if there be a single house, shop, or warehouse, which is not already provided with tenants; indeed most of them have been let before the foundation was laid.

CONSIDERING the great increase of population for these several years, I think we may fairly state the population of the city and suburbs at eighty thousand. In consequence of the rapid fortunes that have been made by commerce and manufactures, many handsome villas have been erected, which greatly ornament the neighbourhood.

It might naturally be expected, from the great influx of inhabitants from the highlands, and almost every part of Scotland, and the difficulty of procuring houses, that house-rent would be high, and it is certainly true, that the expense of living is greater here than in any part of Britain: as the surrounding country can supply only a very small part of the provisions and necessary articles of consumption, great quantities must be brought from a distance, and are therefore very dear.

THERE are some beautiful walks in the neighbourhood of Glasgow, particularly the Green, a fine plain to the east of this city, bounded on the south by the Clyde. The greatest part of this extensive plain is surrounded with trees, among which are several delightful walks; from one of these, on the banks of the Clyde, the annexed view was taken, in which that noble river forms a fine fore-ground (if the term may be here used); close to its banks is situated the house of the Humane Society, a small but neat building; at a greater distance the city, with its numerous spires, presents itself, with one of the bridges over the river, and the back ground is formed of some mountains, which are by no means unpicturesque.

Sharon



Drawn by W. H. W. H.

Engraved by J. M. Green

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THE first branch of commerce in which the citizens of Glasgow seem to have been engaged, was the curing and exporting salmon caught in the Clyde. During the former part of the last century, the commerce of this city appears to have been trifling, but towards the close of it some spirited exertions were made. Considerable quantities of salmon and herrings were exported to France, from whence, in return, were imported brandy, salt, and wine. At the same time a more free communication was opened with the countries on the Baltic, from which they imported wood, iron, and other merchandize. At present, instead of importing iron, this country exports an immense quantity of that metal.

THE spirit of commerce and enterprise which had already taken root, was most essentially benefited by the union of the two kingdoms ; an event from which we must certainly date the prosperity of the city. I have indeed heard it asserted, that the Union was advantageous to England, but detrimental to Scotland. There can be but little doubt, however, that this political event was at least equally advantageous to North Britain as to her southern neighbour. Before this, the speculations of merchants had been much cramped ; the ports to which alone they could trade, lay all to the eastward, and the necessary and dangerous circumnavigation of the island, proved a very considerable bar to the prosperity of their commerce. At the Union they had the liberty of a free commerce to America and the West Indies ; and taking advantage of this favourable circumstance,

they began to prosecute a trade to Virginia and Maryland. When this American trade commenced, the merchants here had no vessels of their own fit for it; they therefore employed English bottoms, and chartered vessels from Whitehaven and other ports. The first vessel, the property of Glasgow, that crossed the Atlantic, sailed from the Clyde in the year 1718. This trade soon became so thriving, that it excited the jealousy of the first commercial towns in England.

IN the year 1735, owing to the occurrence of some favourable circumstances, the commerce began to advance gradually, though slowly. About the year 1750, however, a new mode of carrying on the American trade was adopted, the merchants sending out factors, and disposing of their goods on credit, instead of the former method of bartering one commodity for another. This plan considerably increased the extent of their dealings; and the trade with America continued to advance with rapid strides, till the breaking out of the war with that country, in the year 1775, when it had attained its greatest height. As a proof of the extent of this trade, it may be observed, that out of 90,000 hogsheads of tobacco imported into Britain, Glasgow alone ingrossed 49,000.

THE American war was a dreadful blow to the commerce of Glasgow. All commercial intercourse was stopped; and as the fortunes of many of the merchants were embarked in that trade, and America deeply indebted to them, it proved the ruin of

many who had before reckoned themselves possessed of independent fortunes.

BUT though the commerce of the city was thus interrupted, the spirit which had been raised was far from being extinguished. The merchants began to look out for new sources, and many of them extended their commerce to the West Indies, and the continent of Europe; and though their shipping, at the time of the greatest extent of the American trade, was more than at present, amounting to 60,000 tons, yet it has been for several years on the increase, and so much so of late, that the vessels employed in the trade of Clyde, in 1797, out-numbered those of the preceding year by 252.*

As the Union gave new life and energy to the commerce of Glasgow, so it appears to have been one of the chief causes of the rise and prosperity of the manufactures. That event presented a wide field, from the freedom of trade which this country enjoyed to America and the West Indies. The opportunity was not lost, and from that time several different manufactures have been carried on in this city.

THE linen manufacture, which began here in the year 1725, was for a long time the staple of the west of Scotland. This however, from the predilection for Irish linens, and the rise of cotton goods, has not increased of late, but still a considerable

* Denholm's History of Glasgow.

quantity of linens, lawns, cambrics, checks, diapers, &c. are manufactured. Flax is now spun in this neighbourhood by means of machinery, which is a very great advantage; and should the present moment be laid hold of, when neither Ireland nor Holland are in a state for pursuing their manufactures, this country would, in my opinion, soon be as celebrated for its linens as for its muslins. The flax, at least a great part of it, as I have already pointed out, * might be raised in this country; which would be a double advantage. As there are now so many competitors in the cotton branch, the profits must be much reduced; and though fortunes made by these manufactures will be more common, they certainly will seldom be so large as they have been; it would therefore be worth while for persons possessed of considerable capitals, to turn their attention to the manufacture of linen, which would for a considerable time afford much greater profit.

COTTON is now, however, the grand staple of the Glasgow manufacture; and in order to carry it through all its branches, cotton mills, bleach fields, and print works, have been established not only on the streams in the neighbourhood, but even in remote situations. And though great numbers of mills have been erected, † still they are by no means able to supply the

* Vol. i. p. 156, note.

† A very large mill is erecting in the immediate vicinity of Glasgow, by Mr. Pattison, consisting of six stories; the length of it is 165 feet, and it will contain 22,000 spindles.

quantity of yarn required, so that large quantities are brought from England, and particularly from Manchester.

By a computation made in the year 1791, it appeared that there were 15,000 looms employed in this branch in Glasgow and the neighbourhood; that each loom gave employment to nine persons on an average, in the various stages of the manufacture; so that, including women and children, this branch at that time gave employment to 135,000 persons. Each loom on an average produces goods to the value of 100*l.* per annum, making in the whole the sum of 1,500,000*l.** Since this time, the manufacture has increased rapidly, but to what extent it is not easy to say. I think, however, we may state the increase at one half, and be considerably within bounds.

It is almost needless to mention, that this city has been long celebrated for its University. The numbers of able men who have taught here the different branches of science, as well as the many learned characters who have been educated in this *alma mater*, are well known, far beyond the limits of this publication. Among the professors who have filled different chairs here with lustre, may be mentioned Dr. Robert Simpson, the celebrated mathematician; Dr. Adam Smith, Dr. Hutcheson, Dr. Reid, Dr. Cullen, Dr. Black, and Professor Anderson. Among the great men who have been educated here, may be mentioned Buchanan, the elegant Latin poet and historian;—

* Denholm's History of Glasgow.

Spottiswood ; and Dr. William Hunter.—Mr. Burke was once a candidate for the professorship of logic, but did not succeed.

THIS celebrated seminary of learning was founded in the year 1450, by William Turnbull, Bishop of Glasgow, and confirmed by a bull from Pope Nicholas V. The founder endowed it with an ample revenue, and procured several privileges for its members from James II. The institution, at its establishment, consisted of a chancellor, rector, dean of faculty, a principal who taught theology, and three professors of philosophy.

AT the Reformation the University suffered greatly ; its members who were ecclesiastics having dispersed themselves to avoid the popular fury ; and it was not till the reign of James VI. that the institution began to revive. That monarch granted a new charter of erection, and bestowed upon the University the tythes of the parish of Govan.

THE University is at present composed of the following members, viz. a chancellor, rector, dean of faculty, principal, and sixteen professors. Among the different branches taught here, ought to be particularly mentioned that of Law : the lectures of Professor Millar have long been celebrated, and attended by students from all parts of Great Britain and Ireland.

As a medical school likewise, the reputation of this University has been annually increasing ; and the establishment of a hos-

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*John Anderson, M.A. F.R.S.
Late Professor of Natural Philosophy
in the University of Glasgow.*

Cochrane pinx.

W^m Evans sculp.

pital has contributed not a little to this. The museum of the late Dr. Hunter, containing a very fine collection of anatomical preparations, which was bequeathed to the university, will be a great acquisition to it. Besides the anatomical preparations, this museum contains a curious and valuable library of scarce books and manuscripts; the collection of shells, corals, insects, and fossils made by the late Dr. Fothergill; and a cabinet of coins and medals, ancient and modern, the most complete and best connected in Europe. This last article alone cost Dr. Hunter upwards of 25,000*l.* sterling. Several of the professors accommodate in their houses a limited number of young gentlemen, as boarders and private pupils.

ANOTHER academical institution has been for some years established in this city, denominated

ANDERSON'S INSTITUTION.

THIS institution was founded by the late Mr. Anderson, professor of natural philosophy in the university of Glasgow, who left to the trustees appointed to conduct it, the whole of his valuable apparatus, library, and museum, as well as his property of every other kind. It is under the direction of eighty-one trustees, consisting of the nine following classes: 1. Tradesmen, or mechanics. 2. Agriculturists. 3. Artists. 4. Manufacturers. 5. Physicians and surgeons. 6. Lawyers. 7. Divines. 8. Natural philosophers. 9. Namesakes, or kinsmen of the founder.

EACH class has a power to fill up by ballot all vacancies that may happen in any of them by resignation or death; and if they neglect to do so for a certain time, the vacancies are to be filled up by ballot at a general meeting of the trustees.

FOUR general meetings of these trustees are appointed to be held annually, viz. on the day of the summer and winter solstice, and of the vernal and autumnal equinox. At these meetings every thing relative to the interest of the institution is considered, and decided by a majority of votes.

NINE ordinary managers are annually chosen by the trustees from their own body. These managers meet on the first Thursday of every month, to conduct the business of the institution, and report their proceedings to each of the general meetings.

BESIDES these governors of the institution, nine visitors of the university are appointed by the will of the founder, to superintend their conduct. These visitors are, the lord provost of Glasgow; the eldest baillie; the dean of guild; the deacon convener; the president of the faculty of physicians and surgeons; the dean of the procurators; the moderator of the synod of Glasgow and Ayr; the moderator of the presbytery of Glasgow; and the moderator of the presbytery of Dumbarton.

As the funds left by Professor Anderson were deemed inadequate to carry on the institution with confidence, a number of

public-spirited citizens agreed to support what promised to be so advantageous to the city and neighbourhood; a subscription was opened, and a considerable sum raised. For the two first years the different lectures were carried on in rooms granted by the magistrates of the city to the trustees, in the new grammar-school buildings, and in the trades hall; but the public-spirited exertions of several trustees have put the institution in possession of a handsome building, which, besides affording rooms for the accommodation of the apparatus, library, museum, &c. contains one of the most elegant and commodious lecture rooms in Britain. The form of this room is that of a hemisphere, the diameter of which is forty-five feet. In the centre of the dome is a large window, and in the sides, two small ones, which can be darkened in an instant, when this is necessary to be done for particular experiments. From the centre of the great window is suspended a handsome glass lustre. The table on which the experiments are made is the arch of a circle, round which the different seats rise in concentric arches, properly elevated above each other; and the lecturer being placed in the centre of the circles, of which the seats are portions, every person sits directly facing him. This room will easily accommodate five hundred auditors. On the outside is a suite of apartments, containing the library, museum, apparatus, a chemical laboratory, a workshop, and other conveniences.

THE apparatus is unquestionably the most complete and extensive in Britain. It was collected by Mr. Anderson during

the space of forty years, with great expense and trouble; and since it came into the possession of the institution, it has been considerably augmented by the trustees, particularly the chemical part; and I have added to it a complete collection of modern instruments, made by the late Mr. Adams, of which I allow the use to the institution. The mechanical part is particularly extensive, containing, besides the usual apparatus for demonstrating the principles of mechanics, working models of different kinds of machinery, and a very complete apparatus for illustrating fortification, and every part of military tactics, particularly artillery.* In the museum is a very good collection of minerals, consisting of about 1,500 specimens, now arranged scientifically according to Dr. Babington's tables. The library contains some thousands of volumes of well selected books on all the different branches of physics, among which are the most celebrated French authors:

THIS institution was set on foot in the year 1796, in which year I was appointed professor of physics and philosophy. I began three courses of lectures in November, and have continued them for the three last winters.

THE first is a complete scientific course on physics and che-

* The late Professor Anderson was particularly fond of these subjects. Among other discoveries, he invented a method of preventing the recoil of guns, by making the gun act by means of a piston, on a body of air contained in a box. This enabled him to reduce very much the weight of artillery, so that a six or nine pounder may be carried on a litter by two horses, and fired in that situation.

mistry, with their application to the arts and manufactures. One lecture of this course is delivered every morning, and the following are the branches comprehended in it :

THE properties of matter are first explained, with a view of the theory of Boscovich; after which come the laws of motion, and the principles of mechanics. The principles are first demonstrated mathematically, and afterwards illustrated by experiments, and then the application of each part to the arts and manufactures pointed out, and, where it can be done, illustrated by models of machinery. After this comes the doctrine of heat, which occupies a considerable number of lectures. After illustrating the general effects of heat, and Dr. Black's theory of fluidity and evaporation, I proceed to point out the discovery made by Count Rumford.

HAVING explained the cause of fluidity, we proceed to the principles of hydrostatics and hydraulics, rivers, lakes, inland navigation, &c. The mechanical properties of the air are next examined, which constitutes pneumatics; after which come acoustics, the theory of the winds, and music; the method of curing chimneys according to Count Rumford's plan, meteorology, and aërostation.

BEING thus acquainted with the mechanical properties of the air, we next take a view of its chemical properties, and in about forty lectures, the principles of chemistry are pointed out, and illustrated by experiments; then follows the application of che-

mistry to the different arts and manufactures, particularly etching, and the different modes of aquatinting, dyeing, bleaching and calico-printing, in which the different processes are performed before the students; this part of the course concludes with the application of chemistry to agriculture, and to the analysis of mineral waters.

AFTER this follows a comprehensive view of mineralogy, in which all the specimens are exhibited, and their nature and formation explained, with geological observations.

WE next proceed to the principles of electricity and magnetism; and after having considered these two branches, and particularly the former, at considerable length, we proceed to optics. In this part, the principles of the science are pointed out; afterwards the structure of the eye and the phenomena of vision are considered, and an account of optical instruments given: the subject is finished by a view of the theory and practice of perspective.

THE last part of the course consists of physical astronomy, which is comprised in ten or twelve lectures only, because a more particular consideration of it would exclude some more useful parts of the course, and the completion of this part is left to the lecturer on astronomy and geography.

I TRUST I may be allowed to say, that there is no course in Britain which comprehends so much, and is at the same time

so full on each subject ; and this arises from a particular attention to economy with respect to time. The lecture begins precisely at the hour ; all recapitulation is avoided, and what is usually introduced to spin out less comprehensive courses, carefully excluded.

BESIDES this course, I give a popular one on experimental philosophy : this course only occupies one lecture a week, which is in the evening. Here all mathematical and abstract reasoning is as much as possible avoided, the most pleasing and interesting experiments introduced, and the whole calculated to give an idea of those subjects to those who have not had leisure or opportunity for investigating them, and to refresh the memories of those who have. It is intended likewise as introductory to the scientific course.

THE third is a popular course of chemistry, which takes up, for the first part of the session, one evening, and in the latter part, two evenings every week. In this course, the principles of chemistry, with its application to the arts and domestic economy, are pointed out, and illustrated by experiments.*

BESIDES these courses, during the summer I give a short course on botany, and the theory of agriculture ; and the next

* I have printed a text book for this course, under the title of, "Outlines of a Course of Lectures on Chemistry," which is sold by Cadell and Davies, London.

winter I propose a course on the philosophy of natural history; the following outline of which has been laid before the managers:

THE course is to begin with a general view of the universe, in which I shall describe the different nebulæ, or systems of fixed stars, and point out the probability of their being suns, round which different worlds revolve. We shall next fix our attention on one of them, our sun, and shall examine the different planets which revolve round it, with the various phenomena which they exhibit, and shall then confine ourselves through the remainder of the course to the planet on which we are placed, and in which we are most interested. We shall first examine the different theories concerning its formation, the changes which it appears to have undergone from volcanic fires, and the waters of the ocean; this will give an opportunity of introducing some interesting remarks on mineralogy, on existing and extinct volcanoes, and collections of basaltic pillars. After this, we shall examine the atmosphere which surrounds the earth, and point out its most striking properties, both chemical and mechanical; and shall then describe the several changes this fluid undergoes from winds, thunder, &c. and give an account of the formation of mists, clouds, rivers, and lakes.

WE shall next take a view of the different living beings on the surface of the earth, and first of Man, in which we shall trace his progress from infancy to old age, the unfolding of reason,

the faculty called instinct, &c. Next will follow a view of the philosophy of living matter, with a general outline of physiology; the effects of different climates on the colour of the human species; the progress of man in society, from rudeness to refinement. After this will be pointed out the most remarkable particulars with respect to other animals, such as their modes of life, migration, &c. The course will be concluded with a view of the vegetable kingdom, or the philosophy of botany, with the theory of agriculture and gardening.

BESIDES these courses of lectures, which, excepting the last, I have now delivered for three sessions, two others have been delivered this last winter by Mr. Lothian, the professor of mathematics; the first on the elements of the mathematics, and the second on geography and astronomy.

THE number of students attending my lectures this last session, was 525; the preceding year about 500; and the first year no less than 975. I accommodate in my house a few young gentlemen as private pupils, who, besides receiving private instructions, attend my lectures, and those of the professors in the University of Glasgow.*

THIS institution is undoubtedly well adapted to the education of young gentlemen designed for manufactures or commerce, who are too often sent from the grammar-school to the counting-house, without acquiring that knowledge which will enable

* The reader will recollect that this was written before my removal to London.

them to fill up, in a rational manner, the many vacant hours which every person must find unemployed in business; which will enable him to appear with advantage in that sphere of life to which the fortune he may possess or acquire will entitle him; or which will enable him to make those improvements in his business he would do, if acquainted with the principles on which his different operations depend. In an institution of this kind, he can study what branches he may think proper, at the same time that he is learning, or attending to his business.

A much more important purpose answered by this institution, however, remains to be mentioned. This is the first regular institution in which the fair sex have been admitted to the temple of knowledge on the same footing with men; and it must be said in their praise, that they have not neglected to avail themselves of it; nearly one half of my auditors, to each course, having been ladies, since the commencement of the institution.

THE most splendid seminaries have in all ages, and in every civilized country, been founded and endowed with the most profuse liberality for the education of men; every science that could exalt the genius, humanize the heart, or enlarge the understanding, has been taught them with unremitting pains; while the softer sex, whose minds are naturally moulded to refinement, and who are at least equally capable of the enjoyment of intellectual pleasures, have been left to languish in ignorance,

and suffered, for want of opportunities, to acquire a taste for what is frivolous, and unworthy of the human mind.

IF we trace the progress of society from rudeness to refinement, we shall uniformly find, that the female sex has approached its proper place, as the latter has advanced. In the savage state, the despot Man thought every employment unworthy of his dignity but war and the chase; the culture of the ground as well as all sorts of domestic drudgery were committed to women, who were thought inferior to their lords, because they had not strength to share in their savage employments. The warrior and the hunter could not submit to domestic occupations; he basked whole days by the fire, or in the sun; and a sloth, joyless and supine, succeeded or relieved the dangers of the battle, or the fatigues of the chase.

As refinement took place by slow and gradual steps, the fair sex were treated with more kindness, and in the more polished states became exempted from drudgery, and suffered to dine at the same table with their lords. With the advancement of civilization, attention to the female sex increased, till in the days of chivalry, a ridiculous attention or gallantry took place, which was equally degrading to them, as rational beings, with their former treatment. This kind of attention has been continued to modern times, and the epithet ridiculous, will not, on examination, I think, be deemed improper.

SUPPOSE any sensible and well-informed man should address

to his own sex the flattery and absurd nonsense with which he assails the other; would he not be knocked down, or confined in a mad-house? But why does he treat the female sex in this manner? When in their company, why does he not converse rationally on subjects of taste, of science, or of morality, as when he is in company with men? Because their minds have not been cultivated, and they cannot take a share in such conversation.

BUT is the female mind incapable of cultivation? If we look round, we shall find in all who have had equal opportunities, that at least equal improvements have been made. With what justice the female mind has been charged with having less capacity for knowledge than men, I appeal to all who have read the works of those ladies who have cultivated their understandings.

THE frivolous pursuits for which the fair sex have been condemned, ought not to be imputed to them, but to their education. Can it be expected that the female mind, confessedly more lively and active than that of the other sex, can sink into indolence and inactivity; or can it be supposed that any other than frivolous pursuits can engage the attention, where no care has been taken to instil a taste for rational knowledge, and where the cares of business do not occupy the mind? On examination, it will be found that the uncultivated minds of men, if not immersed in business, give way to much more unworthy and irrational pursuits than those of the other sex.

THE ladies of this city are undoubtedly much indebted to the founder, as being the first person in this island who set on foot a plan of rational education for them, which affords the means of acquiring knowledge, not only useful to themselves in various circumstances of life, and capable of always supplying a rational amusement, without the necessity of seeking it elsewhere; but which fits them for companions for the other sex, and puts them on a footing of equality in conversation; besides, it enables them to fulfil, with credit and propriety, the most important occupation in life, which is generally committed to their charge: I mean the cultivation of the infant mind, which is to lay the foundation of the morals, patriotism, religion, and all the virtues that adorn society. It is justly observed by an excellent writer, that the seeds of virtue and morality are oftener sown by the mother than the tutor.

I FEAR that the egotism I have been obliged to use in speaking of this institution, will have disgusted the reader; but scarcely any account of it has yet been given by any writer, and I wish to hold it up as a kind of model to the larger towns in England, where similar institutions might be easily established. The only difficulty would be the raising of a sum for a building and apparatus; for there is scarcely any place where such an institution ought to be established, where there would not be found some persons capable and willing to give the lectures for the emoluments that might arise, and other considerations.

WHILE we were resting ourselves for a few days at Glasgow, after the fatigue of our journey, before we proceeded to the falls of the Clyde, we received an invitation from the reverend Mr. Rennie, minister of Kilsyth, to visit that place, in order to see a curious mummy which had been discovered in a vault under the church, near a year before. This place is about 14 miles distant from Glasgow. The vault had been closed up; but Mr. Rennie had the goodness to order an opening to be made, through which we descended with difficulty, but were amply repaid for our trouble; for, though the body was by no means in that high state of preservation that it was when first discovered, having received some injury from the air, and still more from the sacrilegious hands which had torn away part of the shroud, still it was wonderfully perfect. Mr. Watts took a drawing of it, which he afterwards corrected under the eye of Mr. Rennie, so as to make it exactly resemble the appearance of the body when first discovered.

MR. RENNIE politely offered to draw up a particular account of the circumstances attending this mummy, which I afterwards received from him, and which I shall insert in his own words.

“THERE is an arched vault, or burying ground, under the church of Kilsyth, which seems to have been the burial place of the family of Kilsyth for many generations.

“As the estate was forfeited, and the title became extinct in the year 1715, it has never been used for that purpose since that



Lady Kilsyth?

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period. The Earl fled with his lady and family to Flanders; and though he returned more than once *incog.* in the habit of a common beggar, and as such lodged with several of his tenants, yet it is certain he was not buried at Kilsyth.

“THE tradition is, and it is said to be confirmed by some papers and letters lately found, that he, and a number of the unfortunate noblesse, who had been concerned in the rebellion, were either murdered, or killed by a sudden accident in Holland, about the year 1717.

“AT all events it seems certain, that this lady, with her infant son, were smothered by the falling in of the roof of the room, in which a number of the nobility who had been concerned in the rebellion were assembled. It is generally said and believed, that this was not by accident, but design: that the landlord and some of his accomplices had cut the beams which supported the roof, and that upon a signal being given, he let it fall in with a view to smother the whole company. It appears that very few escaped, and I never heard it doubted or denied, that Lady Kilsyth and her infant perished in the ruins. Indeed the wound she received on the right temple is still visible, and when the body was first discovered, it was covered with a black patch, about the size of a crown piece. There is no mark of violence on her son. He seems to have been smothered, as it is generally said, sitting on the knee of his mother at table.

“HER body was embowelled and embalmed, and soon afterwards sent over to Scotland. It was landed, and lay at Leith for some time in a cellar, and was afterwards carried to Kilsyth,

and buried in great pomp, according to the form of the church of England. It is not twenty years since some of the inhabitants of this parish died, who were in their youth eye-witnesses of the funeral.

“THE body was inclosed, first in a coffin of fir, next in a leaden coffin, nicely cemented, but without any inscription; this was again covered with a very strong wooden coffin. The space between the two was filled up with a white matter, somewhat of the colour and consistence of putty, apparently composed of gums and perfumes, for it had a rich and delicious flavour. When I was a boy at school, I have frequently seen the coffin in which she lies, for the vault was then always accessible, and often opened: but at that time the wooden coffin was entire. Indeed it was only within a few years that it decayed. Even after this, the lead one remained entire for a considerable time; but being very brittle and thin, it also began to moulder away; a slight touch of the finger penetrated any part of it. In the apertures thus made, nothing was seen but the gummy matter above mentioned. When this was partly removed, which was easily done, being very soft, and only about an inch in thickness, another wooden coffin appeared, which seemed quite clear and fresh.

“BUT no one ever thought of opening it, till the spring 1796, when some rude regardless young men went to visit the tomb, and with sacrilegious hands tore open the leaden coffin. To their surprise, they found under the lead a covering of fir, as clean and fresh as if it had been made the day before. The cover of this being loose, was easily removed. With astonish-

ment and consternation, they saw the body of Lady Kilsyth, and her child, as perfect as the hour they were entombed.

“FOR some weeks this circumstance was kept secret, but at last it began to be whispered in several companies, and soon excited great and general curiosity. On the 12th of June, while I was from home, great crowds assembled, and would not be denied admission. At all hours of the night as well as the day, they afterwards persisted in gratifying their curiosity.

“I SAW the body soon after the coffin was opened. It was quite entire. Every feature, and every limb was as full, nay the very shroud was as clear and fresh, and the colours of the ribbons as bright as the day they were lodged in the tomb.

“WHAT rendered this scene more striking, and truly interesting, was, that the body of her son and only child, the natural heir of the title and estates of Kilsyth, lay at her knee. His features were as composed as if he had been only asleep. His colour was as fresh, and his flesh as plump and full, as in the perfect glow of health; the smile of infancy and innocence sat on his lips. His shroud was not only entire, but perfectly clean, without a particle of dust upon it. He seems to have been only a few months old.

“THE body of Lady Kilsyth was equally well preserved, and at a little distance, with the feeble light of a taper, it would not have been easy to distinguish whether she was dead or alive. The features, nay the very expression of her countenance, were marked and distinct, and it was only in a certain light that you could distinguish any thing like the ghastly and agonizing traits

of a violent death. Not a single fold of her shroud was decomposed, nor a single member impaired.

“BUT no description can give a just or adequate idea of the neatness or elegance of her appearance. I therefore refer to the sketch taken by your friend. I have only to lament that his representation was finished chiefly from my description, as at the time you saw the body it was much sullied, and the shroud injured : but it is as near the original as I can recollect, or as any pencil can express. I can only say it is not a flattering portrait.

“LET the candid reader survey this sketch : let him recal to mind the tragic tale that it unfolds, and say, if he can, that it does not arrest the attention, and interest the heart. For my part, it excited in my mind a thousand melancholy reflections, and I could not but regret that such rudeness had been offered to the ashes of the dead, as to expose them thus to the public view.

“THE body seemed to have been preserved in some liquid, nearly of the colour and appearance of brandy : the whole coffin seems to have been full of it, and all its contents saturated with it. The body had assumed somewhat the same tinge, but this served only to give it a fresher look; it had none of the ghastly livid hue of death, but rather a copper complexion.

“IT would, I believe, have been difficult for a chemist to ascertain the nature of this liquid; though perfectly transparent, it had lost all its pungent qualities, its taste being quite vapid. I have heard, however, that several medical gentlemen carried off

small phials full of it, but do not know whether they made any experiments with it. The rich odoriferous flavour continued not only in the vault, but even in the church, for many weeks, as can be attested by many hundreds; all agreed that it was a mixture of perfumes, but of what kind it was not easy to say: the most prevalent seemed to me to be that of spirit of turpentine, and it is certain that this odour continued the longest.

“THE head reclined on a pillow, and as the covering decayed, it was found to contain a collection of strong scented herbs. Balm, sage, and mint, were easily distinguished, and it was the opinion of many that the body was filled with the same.

“ALTHOUGH the bodies were thus entire at first, I confess I expected to see them soon crumble into dust; especially as they were exposed to the open air, and the fine aromatic fluid had evaporated; and it seems surprising that they did not. For several weeks they underwent no visible change, and had they not been sullied with dust, and the drops of grease from the candles held over them, I am confident they might have remained as entire as ever; for even a few months ago, the bodies were as firm and compact as at first, and though pressed with the finger did not yield to the touch, but seemed to retain the elasticity of the living body. Even the shroud, though torn by the rude hands of the regardless multitude, is still strong, and free from rot.

“PERHAPS the most singular phenomenon is, that the bodies seem not to have undergone the smallest decomposition, or disorganization. Several medical gentlemen (I think you did so

yourself) have made a small incision into the arm of the infant ; the substance of the body was quite firm, and every part in its original state.

“ LADY KILSYTH was of the family of Dundonald ; this appears from Craufurd’s Peerage, and other undoubted authority. She is there called Jean, daughter of Lord William Cochrane, son and heir of William Earl of Dundonald.

“ IT is equally certain that she was first married to the Viscount Dundee, and even after she married her second husband, she still retained this title ; for he was then the heir apparent only of the title and estates of Kilsyth, and of course till the death of his father she was not called Lady Kilsyth.

“ THERE was a singular circumstance attending this connection. She had come on a visit to Colzium, the seat of the family of Kilsyth, about a year after the battle of Killcranky, in which her husband the Viscount Dundee fell. At that time it was said that William Livingston (afterwards Viscount Kilsyth, and her husband) first paid his addresses to her. As a pledge of his love, he presented her with a ring ; but as ill luck would have it, she dropped it next day in the garden. To lose a ring in such circumstances, and so soon, was, no doubt, regarded as an evil omen ; a liberal reward was therefore offered to any person who should find and restore it, but in vain ; it could not be found ; and till the year 1796, nearly a century after, was never heard of.

“ AT that time, however, the tenant of the garden, when digging potatoes, discovered it in a clod of earth. At first he

regarded it as a bauble, but the moment the legend became apparent, the tradition came fresh into his recollection, and he instantly supposed it to be the ring of Lady Kilsyth.

“IT is of gold, and about the value of ten shillings ; about the breadth of a straw, and without any stone. The external surface is ornamented with a wreath of myrtle, and on the internal surface is the following legend, *zours onlly & Euer*. This ring is, I believe, in the possession of Sir Archibald Edmonston, of Duntreath, the proprietor of the Kilsyth estates.”

To this account, given by Mr. Rennie, I can only express my regret, that this body, which had been so admirably preserved, should be wantonly destroyed or damaged. Had it been inclosed in a glass case, when discovered, it would in all probability have remained for centuries in the same state.

AUGUST 15. In the afternoon of this day, we set out to see the falls of the Clyde, accompanied in this journey by the dear partner of my domestic happiness, little thinking that this would be the last jaunt we should take together. The weather was delightful, her spirits remarkably good, and I think I never contemplated the beauties of nature with more pleasure than during this little tour. Though I beheld the scenery of the highlands with that enthusiasm which I always feel when contemplating the grand or beautiful features of nature, yet I felt a dreary blank in my mind, on the reflection that the enjoyment of those scenes was not shared by her. This blank was now filled completely.

ALAS ! how bitter is the reflection that now daily and hourly fills my mind ! I am an insulated being, and the beautiful face of the creation presents to me nothing but a dreary waste. When I endeavour to call to my recollection the happiness I enjoyed in this little excursion, I can scarcely think it real, so faint a trace has it left behind.

'Tis like the snow falls in the river,
 A moment white—then melts for ever ;
 Or like the borealis race,
 That flit ere you can point their place ;
 Or like the rainbow's lovely form,
 Evanishing amid the storm.*

It seems as if my whole life had been a life of misery, while the swift moments of happiness have scarce left an impression. How strongly do I feel the force of the following beautiful sentiment :

Ay de mi ! un Ano felice
 Parece un soplo ligero :
 Pero sin dicha un instante
 Es un siglo de tormento.

I AM sensible that I ought to apologize to my readers for the introduction of private misfortunes, in which few of them can be interested ; but reflections similar to these continually dwell on my mind, and almost exclude every other idea. No wonder then that they should sometimes escape from my pen.

* Burns.

THIS short tour presents undoubtedly one of the most delightful rides in Scotland ; the road from Glasgow is generally near the Clyde, whose banks are beautifully wooded. The first six miles of it are not however very interesting ; at that distance we came to the village of Uddingstone, and soon after to the ruins of Bothwell castle, situated on the north bank of the Clyde. Though it has been long in ruins, it still exhibits remains of its ancient grandeur, and the power of its possessors. The whole building is very extensive, it has the form of an oblong square, being 234 feet in length, and 100 in breadth ; its walls are upwards of fifteen feet in thickness, and in many places sixty feet high, built of a kind of red grit ; three of the towers yet remain out of the four, of which two are pretty entire ; in the highest, the stair-case is still tolerably perfect, and conducts to the top, from whence is a beautiful and extensive view to the westward. The interior area of the castle is now converted into a bowling-green and flower-garden.

THIS castle made a conspicuous figure in the history of Scotland. Concerning the date of its origin, history and tradition are however equally silent. In the reign of Edward I. it was the residence of the English governor ; we find it in particular in the possession of Aimer de Valence, Earl of Pembroke, a governor of Scotland during the reign of this monarch, and it was hither that he fled upon his defeat by Bruce, at the battle of Loudon-hill in 1307. On the forfeiture of Pembroke, it had a variety of possessors ; and, among the rest, a man most

notoriously marked in the annals of Scotland for the audacity and splendour of his crimes, the Earl of Bothwell, whose name it still bears. From Bothwell it descended to Archibald the Grim, Earl of Douglas, in whose family it continued till their attainder in 1445. After a variety of transmissions, it reverted to the family of Douglas in 1715, in whose possession it now remains. Near the castle is Bothwell-house, the present residence of Lord Douglas, a very handsome building of red stone, charmingly situated, and surrounded with woods.

OPPOSITE to Bothwell castle, on the other side of the Clyde, stand the ruins of Blantyre Priory, on a rock rising almost perpendicularly out of the river; and a considerable part of the walls, on a line with the brink of the precipice, still remains. Between the castle and this priory, tradition informs us, there formerly existed a subterraneous passage under the Clyde, by which the female part of its inhabitants fled in time of danger to the protection which a monastery afforded.

LITTLE account can be now procured of the origin and history of this religious establishment. It appears from some ancient records, that it was originally a sort of colony from the monastery of Jedburgh.* Upon the abolition of religious houses in Scotland in the sixteenth century, it fell into the hands of Walter Stuart, lord privy seal, who was afterwards created Lord Blantyre, in whose family it has since continued.

* See Stat. Account of Blantyre. Denholm's History. Hope's Minor Practics.

AFTER viewing these memorable monuments of antiquity, we passed through the village of Bothwell, where is an ancient church, a good specimen of Gothic architecture. At the distance of about a mile from Bothwell, we came to Bothwell bridge, memorable for a battle in the year 1679 between the whigs, or covenanters, and the king's army commanded by the Duke of Monmouth, and which was fatal to the affairs of the former. At the distance of two miles further, we came to Hamilton, a town of considerable size, but irregularly built. It attracts the attention of the traveller, chiefly on account of Hamilton house, the residence of the Duke of that name. This, though a very superb building, is a heavy one, consisting of a front or centre, with two very deep wings. It seems to have been built at different periods: the most ancient part was erected in the year 1591, but the more modern, and most considerable part, was built about the end of the last century. Some of the apartments are very large, particularly the gallery, in which is a good collection of pictures, decidedly, I believe, the best in Scotland.

AMONG these is the celebrated picture by Rubens, of Daniel in the lion's den, which is undoubtedly one of the finest productions of that great master. I cannot give a better description of this fine picture than in the words of Gilpin :

“ THE prophet is represented sitting naked in the middle of a cave, surrounded by lions. An opening at the top, through which he had been let down, affords light to the picture. In

his face appears ineffable expression. Often do we hear the parading critic, in a gallery of pictures, displaying the mixed passions where they never existed. For myself, indeed, I cannot see how two passions can exist together in the same face. When one takes possession of the features, the other is excluded. But if the mixed passions ever did exist any where, they exist here. At least from the justness of the representation, you are so entirely interested in the action, that the imagination is apt to run before the eye, and fancy a thousand emotions, both of hope and fear, which may not really exist. The former appears the ruling passion; but a cold damp sweat hangs evidently on the cheek, the effect of conflict. The whole head indeed is a matchless piece of art. Nor is the figure inferior. The hands are clasped: agony appears in every muscle, and in the whole contracted form. In a word, nothing can be more strongly conceived, more thoroughly understood, more delightfully coloured, or more delicately touched, than this whole figure. I should not indeed scruple to call it the noblest specimen I have ever seen of the art of Rubens. It is all over glowing with beauties, without one defect. At least it had no defect which I was able to discover.

“BUT although the principal figure (on which I dwell, because it is so very capital) exceeded my expectation; yet the whole of the picture, I must own, fell far beneath it.

“THE composition is good. The lions, of which there are six, with two lionesses, are well disposed; and stand round the prophet with that indifference, which seems to have arisen from

satiety of food. One is yawning, another stretching, and a third lying down. An artist of inferior judgement would have made them bay at the prophet, and withheld by the Almighty from devouring him, as a butcher restrains his dog by a cord. The only fault I observed in the composition, arises from the shape of the picture. The painter should have allowed himself more height, which would have removed the opening at the top to a greater distance, and have given a more dismal aspect to the inside of the den. At present the opening is rather paltry. This has induced some judges to suppose, what does not seem improbable, that the picture was not originally painted on one great plan; but that the painter, having pleased himself with the figure of Daniel, added to the appendages afterwards.

“BUT the great deficiency of this picture is in the distribution of light. No design could possibly be better adapted to receive a better effect of it. As the light enters through a confined channel at the top, it naturally forms a *mass* in one part of the cave, which might *gradually fade away*. This is the very idea of *effect*. The shape of the mass will be formed by the objects that receive it; and if bad, must be assisted by the artist's judgement. Of all this Rubens was aware; but he has not taken the full advantage which the circumstances of his design allowed. A grand light falls beautifully on his principal figure, but it does not graduate sufficiently into distant parts of the cave. The lions partake of it too much; whereas, had it been more sparingly thrown upon them, and only in some prominent parts, the effect would have been better; and the grandeur and

horror of the scene more striking. Terrible heads standing out of the canvass, their bodies in obscurity, would have been noble imagery, and have left the imagination room to fancy unpictured horrors. That painter does the most, who gives the greatest scope to the imagination; and those are the most sublime objects, which are seen in glimpses, as it were mere co-ruscations; half viewless forms, and terrific tendencies to shape, which mock investigation. The mind, startled into attention, summons all her powers, dilates her capacity, and from a baffled effort to comprehend what exceeds the limits of her embrace, shrinks back on herself with a kind of wild astonishment, and severe delight. Thus Virgil describing the gods, who, enveloped in smoke and darkness, beat down the foundation of Troy, gives us in threewords, *apparent dira facies*, more horrid imagery, than if he had described Jupiter, Juno, and Pallas, in a laboured detail, with all their celestial panoply. For when the mind can so far master an image, as to reduce it within a distinct outline, it may be grand, but it ceases to be sublime, if I may venture to suggest a distinction. It then comes within the cognizance of judgement, an austere, cold faculty; whose analytic process, carrying light into every part, leaves no dark recesses for the terror of things without a name.”*

I DO not profess myself a connoisseur, in painting: I must own, however, that the same ideas concerning the disposition of the light struck me forcibly when I first saw this celebrated

* Gilpin's Observations on several Parts of Great Britain, Vol. II.

picture ; but I cannot by any means agree with this writer, that the lions are painted in a very slovenly manner ; on the contrary, they seem to be executed in a highly finished style. This picture is unquestionably the first in Scotland.

HERE is likewise an admirable portrait of the Earl of Denbigh, dressed in a red silk jacket, and holding a gun in his hand. His hair is short and gray, and the countenance is full of nature and character. Some travellers have attributed this picture to Rubens, but it appears to be much more in the style of Vandyke.

THE marriage feast by Paul Veronese, is likewise a very fine picture, in which the obstinacy and resistance of the intruder, who came without the wedding garment, is finely expressed.

HAMILTON HOUSE is situated unpleasantly on a plain, very near the town, which formerly stood clustering round it, when mutual defence and protection rendered this necessary. By degrees many of the houses were pulled down, and since this time the town has extended to the south and west, and left the house in some degree detached.

HAMILTON contains about four thousand inhabitants, and is ornamented with several public buildings, among which is particularly to be noticed the parish church; this elegant building was designed by the elder Adams, and being situated on an elevated piece of ground, is seen to great advantage.

HAMILTON has now a considerable share of the cotton manufacture, the manufactures of Glasgow employing a great number of weavers in this place. A manufacture of thread lace has been carried on here for a number of years, but it is now on the decline.

AFTER seeing what was remarkable at this place, we proceeded through the town, along the Carlisle road, and at the distance of about a mile came to the Avon, a very picturesque river, over which is a bridge, concerning the erection of which there is the following tradition :

SOME controverted point was to be settled by a plurality of voices, at a meeting of the clergy to be held at Hamilton upon a certain day. A priest, who lived southward from the town, had been very zealous on one side of the controversy, and had prevailed with a great number of the brethren in his neighbourhood to join him in supporting it. But on the day fixed, when they came to the side of the river, it was swollen with rains beyond the possibility of passing, and the opposite party carried the point ; at which the priest, who was very rich, was so much provoked, that he immediately ordered a bridge to be built at his own expense, to prevent such a disappointment in future.*

LEAVING our chaise at this bridge, we entered the Duke's grounds by a gate, and proceeded up a hill to Chatelherault, a

* Stat. Account of Hamilton.

summer-house belonging to the family of Hamilton: this building, which is in the French style, is said to have been intended as an imitation of the castle of Chatelherault in France, of which the chief of this family was formerly proprietor; he likewise had the title of Duke of Chatelherault.

It is placed on a smooth lawn, the sides of which are sloped, and appears a very large building, on account of the length of the front which it presents, and the four towers in this front; we found, however, that it was more showy than substantial; for this apparently magnificent building consists of a small dining room and a drawing room, with an unfurnished apartment above in one end, and a stable and dog kennel in the other. From the upper room is a very fine view of the country to the northward, bounded by the Campsie hills and Benlomond. In the dining room is a portrait of a horse as large as life, by Stubbs, but I have seen much better pictures by that artist.

This building is situated on the banks of the Avon, which are here very steep and romantic, and is certainly a much more eligible situation than that on which Hamilton house is placed. Indeed the ancient residence of the family, which was called Cadzow Castle, was on the opposite bank of the Avon, where the ruins still remain. It was plundered, and partly demolished, by the army of the regent Murray, in the reign of Queen Mary, since which it has continued in a state of desolation and ruin.

A LITTLE below Cadzow, on the same side of the river, is Barncluith, or rather the remains of it. This was formerly a villa built in the Dutch style, by one of the Hamiltons of Pentcaitland. The house is situated on a lofty and steep bank of the Avon, with terrace walks cut out of the rock one under another, descending towards the river. Evergreens cut into various shapes, according to the taste of the times, stood along these walks. On favourable spots were built small pavilions, and a jet-d'eau, in the middle of a bason, spouted water to a considerable height. This spot overlooked the fine wooded banks of the Avon, rising like a vast ampitheatre, with here and there some prominent rocky cliffs, pushing out their bold fronts, while the water was seen foaming below along its rocky channel. The benevolent proprietor executed these works with a view of giving bread to the poor, and at the same time supporting a habit of industry, in the time of the famine which happened towards the end of the last century.

ABOUT a mile beyond the Avon bridge we left the Carlisle road, and turning to the left entered Clydesdale, a charming valley, adorned with several seats of nobility and gentry. Among these, Maudslie castle, the seat of the Earl of Hyndford, particularly arrests the attention, both on account of its fine situation, and the beauty of its architecture. It is situated on the north bank of the Clyde, and though a modern building, begun in the year 1792, and very lately finished, it is built in the form of a claste, and has, in my opinion, a much nobler effect than the most

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Drawn by W.H. Fisher.

Engraved by Wm. Green.

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superb structure in the modern style. It consists of various orders of architecture, and was designed by R. Adam. Though the modern buildings may be more commodious, yet the ancient castles have an air of grandeur and magnificence, better suited to the residence of a nobleman. The offices are in a style corresponding to the house; indeed, I have seldom seen a building that pleased me more.

SOON after we passed Maudslie castle, we crossed the Nethan, by a bridge, above which is a very romantic glen; on a lofty promontory in this glen, stand the ruins of Draffin, or Craignethan castle, anciently a seat of the family of Hamilton, but now the property of Lord Douglas. In this fortress the unhappy Mary found a short asylum, after her escape from the castle of Lochleven.

PROCEEDING a few miles further, we entered the wood of Stonebyres, and soon heard a hollow murmuring noise, which increased as we advanced; soon after emerging from the wood, we saw a direction post, pointing out the fall of Stonebyres. Alighting from the chaise we descended a steep hill, and at about two hundred paces from the road came to a steep bank of the river, where, from a chair placed there for the purpose by Mr. Dale, we contemplated in security this grand and awful scene. It consists of three breaks, but when the river is full it has the appearance of one unbroken sheet, about sixty feet in height. The river is perfectly smooth and tranquil above, but being here

contracted, forces itself with inconceivable fury over the shelving rocks. The surrounding scenery is very fine, and the immense quantity of water thus tumbling headlong down the rocks of schistus, produces a very grand effect. The dark colour of the rocks divided into strata, or layers, and clothed with wood to the top, contrasted with the white foam of the cataract, forms a scene of the highest sublimity. From the lowest fall the spray rises high into the atmosphere, and gives an indistinctness to the scenery that greatly increases its grandeur.

THIS fall is the *ne plus ultra* of the salmon which come up the river Clyde; none of them get above it, though their endeavours in the spawning season are incessant and amusing.

AFTER having contemplated this scene for a considerable time, we returned to our chaise, and proceeding on the road we crossed the Clyde by a bridge of three arches, and soon reached Lanark, which is about two miles distant from the fall of Stonebyres.

LANARK is one of the most ancient towns in Scotland: some of the best antiquarians suppose it to be the Colonia of Ptolemy, which supposition is by no means improbable, as it is certain that the Romans had in the neighbourhood several stations or camps, and that it lay very near the line of the great Roman road called Watling-street. This town was erected into a royal burgh by Alexander I. whose charter, together with the subsequent ones of Robert I. and James V. was confirmed by Charles I. in the year 1632. This burgh is classed with Linlithgow, Selkirk, and

Peebles, in sending a member to parliament. The electors consist of the common council and deacons of crafts : it is governed by a provost, two baillies, a dean of guild, and thirteen counsellors. The number of inhabitants in 1795 amounted to 2260,* but it has increased very rapidly since the introduction of the cotton manufactures, and cannot, I think, be now less than 3000. There are some tolerable public buildings, particularly the church, town-house, and grammar-school, and a very good inn, which is much frequented in summer by strangers who come to visit the falls of Clyde. †

* Stat. Account of Hamilton.

† In this house is kept a book, in which strangers who visit the falls usually insert their names, with what remarks they may think proper. On looking over it, we distinguished many celebrated names, and some apposite observations. The following impromptu had been inserted a few days before our arrival :

What fools are mankind,
 And how strangely inclin'd,
 To come from all places
 With horses and chaises,
 By day and by dark,
 To the falls of Lanark !
 For, good people, after all,
 What is a waterfall ?
 It comes roaring and grumbling,
 And leaping and tumbling,
 And hopping and skipping,
 And foaming and dripping ;
 And struggling and toiling,
 And bubbling and boiling ;
 And beating and jumping,
 And bellowing and thumping.
 I have much more to say upon
 Both Linn and Bonniton,
 But the trunks are tied on
 And I must be gone.

THE weaving of muslin is the principal manufacture of this place, and employs a great number of hands. A great quantity of shoes were formerly manufactured here, and exported to America ; but this manufacture received a severe check by the late war with that country, which it never recovered. A considerable quantity of stockings are manufactured in this place, upwards of sixty frames being employed in this business.

AUGUST 16. After breakfast we went to see the other falls, which are about two miles from Lanark. When we had proceeded about a mile and half along a very good road, we came in sight of New Lanark, a charming village built by Mr. Dale : his cotton mills are very handsome, and the whole village, with its situation, particularly striking. As we passed through it the children were just coming from their work to breakfast ; on this account we did not stop, as we wished to see them at work ; we therefore proceeded up a road carried very near to the romantic banks of the Clyde, and entering the grounds of Bonniton, procured a guide at the porter's lodge, who conducted us to the first view of the Corra-Linn, which is an imperfect one, part of the fall being concealed by rocks and wood.

As carriages can proceed no further, we got out and ascended a zig-zag walk, which brought us to a seat commanding a fine view of this noble fall. Here the organs of sense are hurried along, and partake of the turbulence of the roaring waters ; the powers of recollection are almost suspended, and it is some time

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Drawn by H. L. Jones.

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Cerra Lina.

before the spectator is enabled to contemplate with any tolerable complacency the sublime horrors of this scene.

THE stratified rocks which here confine the Clyde, form a kind of amphitheatre of great height, very much resembling, as Mr. Pennant justly observes, a stupendous piece of natural masonry. The water of the Clyde being confined by the jutting of the rocks immediately above the fall, acquires a great velocity, with which it rushes over the rampart with a thundering noise into the deep below.

THIS fall differs in character from that of Stonebyres, but like it consists of three falls, which, when the river is swollen by rains, form one sheet. The upper fall is only a small one; the second much larger; but the lowest is by much the finest both in breadth and height. Just above the second fall, on the right, is a mill; and at a considerable height above stands the old castle of Corra, formerly the residence of a branch of the Sommerville family; a little lower, and more distant from the river, is the house of Corra, a modern mansion, almost hid by lofty trees. When the river is full, the impetus of the water is so great, that it shakes the castle and neighbouring rocks, and our guide informed us, that the house is sometimes so shaken as to spill water in a glass. A fine spray arises from the water and fills the linn, in which we saw the prismatic colours, the sun happening to shine very favourably at the time.

THE rocks are wooded to the top, and the trees stretch their arms almost across the fall, which adds greatly to the beauty of the scene ; the upper part of the fall is confined within a narrow compass by rocks, and tumbles down in one unbroken sheet : the lower part, however, has room to spread, and falling over a rugged precipice is beautifully broken. The height of this fall is upwards of eighty feet.

SOME persons prefer this fall to Stonebyres, while others, on the contrary, give the palm to the latter, which though not so high is much wider. They are undoubtedly both very noble falls ; but their character is so different, that it is difficult to say which deserves the preference, as they do not admit of a comparison. The best view of the Corra-Linn, is a few yards above the seat.

THE channel of the Clyde above the fall is bounded by rocks of great height, wooded to the top ; down this rough channel the river rolls with great impetuosity. From the Corra-Linn, the same walk leads us along these banks to the fall of Bonniton, which is about three-quarters of a mile higher. From a rock hanging over the Clyde, on which a small bastion has been built, is a very good though somewhat distant view of this fall, which though not so high as either of the others, is very beautiful : the height of it is only about 27 feet ; it is not broken like the others, but the river here shoots down in one broad sheet into a hollow glen, whence some of it recoils in foam and mist. This fall, though certainly not so grand as the others, is a very

graceful fall, if the expression may be allowed. The surrounding scenery is not, however, so picturesque, on account of a lumpish hill in the back ground, which would be much improved by planting.

FROM Bonniton-Linn we retraced our steps a little way, but soon ascended by a path, branching to the right, which brought us to a pavilion placed on a hill, directly above the Corra fall. From this pavilion is a very fine bird's-eye view of the fall; and indeed this view, though more distant, is I think nearly equal to that from Ossian's hall near Dunkeld. Here likewise, as at Dunkeld, mirrors are placed, by the reflection of which we had different views of the water. From the west window of this pavilion is a fine view of the cotton mills, and picturesque village of New Lanark, with the variegated banks of the Clyde, the town of Lanark, and the distant hills in the counties of Stirling and Argyle.

THE cotton mills and village of New Lanark next claimed our attention. The situation of these works is very romantic; they are surrounded on all sides by high grounds, rising in the form of an amphitheatre, which effectually screen them from view, till we arrive in their immediate vicinity, when all at once, as if by enchantment, they burst upon the sight, and from the magnitude and grandeur of their appearance, produce a happy effect.

THE great command of water which could here be obtained, was the principal inducement to erect a manufacture of this kind in this place. The water from the Clyde, which drives the great body of machinery, is for many hundred yards carried through a subterraneous aqueduct, cut for the purpose out of the solid rock. The first mill, which is one hundred and fifty-four feet long, was built in 1785, and having been consumed by fire about three years after its erection, it was rebuilt in 1789. The second is exactly of the same dimensions. The third is one hundred and thirty feet, and the fourth one hundred and fifty-six feet in length.

THE two mills which were first built, contain twelve thousand spindles, for spinning water-twist: the other two are occupied by jennies for spinning mule yarn.

THE village owes its existence to the erection of these mills. It consists of neat, substantial houses, forming two streets, about half a mile in length, broad, regular, and clean. Near the centre of the village are the mills, and in front of these a neat modest mansion, the occasional residence of the proprietor, with others for the principal managers.

THIS village contains not less than 1500 inhabitants, about 1400 of whom are employed about the works, the remainder being either too young or too old to work. Of these, about 500 children are fed and clothed by Mr. Dale; the others lodge

with their parents in the village, and have a weekly allowance for their work.

THE cotton mills are not different from those in other parts of the country; but what particularly attracts the attention of the traveller, is the healthy and happy appearance of the children employed in these works. The regulations adopted for the preservation of the health and morals of those employed in these extensive works, form a striking contrast to many others, which can only be regarded as seminaries of wickedness and sources of disease.

FOR the preservation of their health when at work, fresh air is constantly introduced into the mills by opening the windows, and by air holes which are opened in summer below every second window. The air is besides kept pure by frequently washing the floors and machinery with hot water, and the walls and ceilings with lime.

THOSE who have their maintenance in lieu of wages, are lodged in one house, in six large apartments, containing a bed for every three children. The ceilings and walls of these apartments are white-washed twice a year with hot lime, and the floors once a week with hot water and sand. They sleep on cast iron bedsteads, on a bed tick filled with straw, which is changed once a month. A sheet covers the tick, and over that are thrown one or two pair of blankets and a coverlet, as the

season requires. The bed-rooms are swept, and the windows thrown open, every morning, in which state they remain through the day. Many of the children have provided themselves with boxes with locks, in which they keep their boxes, or any other little property to which they annex a value. The upper clothing of both boys and girls in summer is of cotton, and these, as they have spare suits, are washed once a fortnight. In winter the boys are dressed in woollen cloth, and, as well as the girls, have dress suits for Sundays. Their linens are changed once a week.

THEIR provisions are dressed in cast iron boilers, and consist of oatmeal porridge for breakfast and supper, which they eat with milk during the summer. In winter, its substitute is a composition of molasses and beer. For dinner, they have every day barley broth made from fresh beef, which beef is daily divided among one half of the children, in quantities of about seven ounces to each; the other half are served with cheese, in quantities of about five ounces to each; so that they have alternately beef and cheese for dinner, excepting now and then a dinner of herrings in winter as a change.

To the beef and cheese is added a plentiful allowance of potatoes, or barley bread, which is excellent; and of which last they have a portion every morning before going to work. The working hours are eleven and a half each day, with the intermission of half an hour for breakfast, and an hour for dinner.

Seven is the hour of supper, soon after which the teaching commences, and continues till nine o'clock. Three professed teachers are employed by Mr. Dale for the purpose, who teach, during the whole day, those who are too young to work; on going into the day-school, we heard some little boys read in a very superior manner. In the evening, these three masters are assisted by seven others, one of whom teaches writing. There is likewise a person who teaches sewing to the girls, and another who occasionally teaches church music. The teachers have written instructions, pointing out how far they are to carry forward their scholars, before they are transferred to the next higher class. At dinner the masters preside over the boys at table, performing the office of chaplains, and conduct them on Sundays to divine worship, where they sometimes receive religious instructions from their benevolent master. In the evening of Sunday, all the masters attend to teach, and give religious and moral instruction.*

A GREAT proportion of the inhabitants are highlanders, chiefly from the counties of Argyle, Caithness, and Inverness.

IN 1791, a vessel carrying emigrants from the Isle of Skye to America, was driven by stress of weather into Greenock, and about two hundred persons were put ashore in a very destitute situation. Mr. Dale offered them immediate employment, which the greater number of them accepted. Soon afterwards, with a

* See Stat. Account of Lanark, and M'Nayr's Guide.

view to prevent further emigration, he notified to the people of the highlands and Hebrides, the encouragement given to families at the cotton mills, and undertook to provide houses for two hundred families in the year 1792; these were finished in 1793, in consequence of which a considerable number of highlanders have taken up their residence at New Lanark. Several families, who were last year driven from Ireland by the distracted state of that country, found immediate employment here.

OUT of near three thousand children who have been employed at these mills between the years 1785 and 1797, *only fourteen have died*; and not one judicial punishment has been incurred. What ground for exultation must this afford to the worthy owner! What a number of people are here made happy and comfortable, who would, many of them, have been cut off by disease, or, wallowing in dirt, been ruined by indolence! The heart of my dear Catharine, which was always feelingly awake to the misery or happiness of others, exulted at the sight, and I never felt more gratified in my life. This scene formed a striking contrast to what I had witnessed in the highlands. If I was tempted to envy any of my fellow-creatures, it would be such men as Count Rumford and Mr. Dale, for the good they have done to mankind. How truly may it be said of them, "when the ear heard them, then it blessed them, and when the eye saw them, it gave witness of them; because they delivered the poor that cried, the fatherless, and him that had none to help him. The stranger did not lodge in the street; they opened their doors to the tra-

veller ; the loins of the naked blessed them, and were warmed with the fleeces of their flocks." *

THOUGH we returned from Lanark immediately to Glasgow, yet as the scenes I have just been describing are in the road from the latter place to Moffat, I shall here insert a short description of this village, with some account of its mineral waters, from notes taken during a three weeks' residence there the preceding year.

FROM Lanark to Douglas Mill is twelve miles, the road is by no means unpleasant. At Douglas Mill is a very comfortable inn, and very near it a good house, the residence of Mr. Campbell Douglas. At the distance of about two miles is the village of Douglas, and in the neighbourhood the ruins of Douglas castle, situated on an elevated piece of ground, and surrounded by ancient woods. From Douglas Mill to Elvan Foot is thirteen miles ; the most dreary ride that can be conceived, nothing but barren lumpish hills being visible. The road goes over Craufurd moor, as bleak a country as exists any where : the inn at Elvan Foot is a wretched one ; it is, however, the stage house, and a bad chaise or two are kept. Here is a handsome bridge over the Clyde, and at the distance of about five miles from Elvan Foot are the rich lead mines belonging to Lord Hopeton : the district is called

* Since this was written, an English company have purchased Mr. Dale's mills, and a very worthy friend of mine, Mr. Owen, is to have the management of them, who, I have no doubt, will endeavour to perfect the work which Mr. Dale has so happily begun.

Lead Hills, and there is a village containing not less than fifteen hundred persons, who are supported by the mines, about five hundred of whom work in them : they are employed in these mines only six hours out of the twenty-four : having therefore a great deal of spare time, they employ themselves in reading, and for this purpose have established a subscription library, which is very extensive. This way of spending their time gives a steadiness, sobriety, and gentleness to their character, and forms a striking contrast between them and the miners of Cornwall.

THE varieties of ore found here are the potter's lead ore, the small or steel-grained ore, which is very rich in silver, and the white lead ore or carbonat of lead, which is curiously ramified like petrifications of moss. The galena contains about seventy parts in the hundred of lead ; the carbonat about sixty. Some specimens of greenish phosphat of lead are likewise met with.

THE mines are wrought by two companies, who give every sixth bar to the proprietor for rent. A great part of the lead is sent to Leith, where the silver is extracted from it by a company established for that purpose.

PIECES of gold have frequently been found about Lead Hills, in the gravel beneath the peat : small grains of this metal are likewise found among the sand in the rivulets of this neighbourhood, and in the Clyde, particularly between this place and Elvan Foot.

MACKENZIE, in his *Life of Boethius*, says, "that James IV. having got experienced workmen well skilled in mines, they had so good success, that when James V. went over to France, at a sumptuous entertainment after his marriage, for a dessert, instead of sweetmeats, he presented many plates filled with gold coined in Scotland, and dug out of the mines on Craufurd moor, which were distributed among the company." Some German adventurers were, on stipulated conditions, permitted to explore these parts in quest of gold; they employed about three hundred men for several summers, and procured metal to the value of about 100,000*l.* sterling, the greatest part of which they carried to Germany. These adventurers probably exhausted what was near the surface, and since that time no further researches have been made.

THOUGH this country is so rich in metals, yet nothing can equal the barren and dreary appearance of the surface; neither trees, shrubs, nor verdure, not even a picturesque rock amuses the eye of the traveller.

THE same may be said of the country between Elvan Foot and Moffat, a very bleak and dreary ride of thirteen miles. From these high grounds, and a very short distance from each other, spring the Clyde, the Tweed, and the Annan, which pursue their courses to different parts of the kingdom, a circumstance that points out the great height of their sources. The Clyde runs westward into the Atlantic; the Tweed eastward to the

German ocean ; while the Annan directs its course to the south, and falls into Solloway Firth.

WHEN we come to a steep hill, about five or six miles from Moffat, the country puts on an appearance somewhat different ; though barren and mountainous, it is more interesting ; the forms of the hills become picturesque, and the blue mountains of Cumberland form no bad back ground.

THE village of Moffat is situated on a rising ground, at the head of a plain or valley, extending more than twenty miles along the banks of the Annan : it is encompassed on the east, north, and west, by hills of different heights. The principal, and indeed the only street is very spacious : there are two inns, and some very good lodging houses, which are let to invalids who resort to this place during the summer. The church is a handsome building surrounded by trees, which produce a good effect. Indeed, the view of this village is by no means unpicturesque. The annexed view is taken from the Dumfries road, at the distance of about a mile from Moffat. The number of inhabitants is something more than a thousand. Lord Hopeton has a house here, in which he occasionally resides.

MOFFAT has been long celebrated for its mineral waters, and on this account, numbers of invalids from Edinburgh, Glasgow, Dumfries, and various parts of Scotland, resort to it every year ; and though in winter a residence here would be very dull and



Drawn by W. H. W. H. W.

Engraved by J. W. Green.

W. H. W. H. W.

ANTON, LENOX

dreary, in summer the village is all life and bustle. The two inns accommodate a considerable number, and there are several private lodging-houses in which families can be accommodated.

THE climate of Moffat is said to be remarkably healthy, and the air so extremely pure, as to occasion sneezing and other marks of superoxygenation in persons not accustomed to it, particularly if they have lived for some time in a large town or confined situation: its effects are particularly exhilarating and bracing, as I have myself experienced; and though the showers of rain are frequent and sometimes heavy, as might be expected in a mountainous country, yet a moist or foggy atmosphere is seldom seen. Every opening of the clouds discovers a sky of a beautiful azure, which, in a clear day, assumes a distinctness and brightness that might vie with an Italian sky. These circumstances, with exercise, contribute, perhaps, as much as the waters to restore the exhausted and debilitated constitution.

THE mineral waters are of two kinds, sulphureous and chalybeate; the first has long been distinguished by the name of the Moffat Well, and is situated about a mile and a half from the village. A good carriage road has been made to it, and there is a room and stables for the accommodation of the company while drinking the water.

THE spring oozes out of a rock, at the distance of two or three yards only from a little rivulet; a few yards above it is a bog, from whence it probably derives its sulphureous impregnation. The well is covered over with a stone building, inclosing a pump: on one of the stones of this building is the following inscription:

Æque pauperibus prodest

Locupletibus æque.

And on a stone about three yards distant from the building, the following:

Infirmo capiti fluit utilis,

utilis alvo.

THE water has a strong smell resembling bilge water, or the scourings of a foul gun, like the sulphureous waters of Harrogate, though not quite so strong. It has a slight saline taste, and sparkles considerably when first taken from the spring, particularly when poured out of one glass into another. The sides of the well are lined with a whitish crust, and when the water has been suffered to stand for some days without pumping, it becomes covered with a white film; both these, when dried, burn with a blueish flame and suffocating smell, which indicate their being sulphur.

ON the ninth of October, when the temperature of the air was 54°, and that of the adjoining brook 48°, the temperature of the spaw was 50°.

THE next day, when the temperature of the air was 60°, that of the spaw was 49°.

THE following experiments were made on the water taken from this well, with the view of ascertaining the nature of its contents.

1. Characters written on paper with *acetite of lead*, were rendered visible on being immersed in the water. The colour was at first brown, and on remaining longer, quite black.
2. A solution of acetite of lead in distilled water, dropped into the water, caused a copious brown precipitate.
3. Tincture of galls produced no change.
4. Lime water produced a very slight turbidness.
5. Tincture of turnsole produced scarcely any sensible redness.
6. Acid of sugar produced no change.
7. Muriat of barytes produced no effect.
8. Nitrat of silver caused a white cloudy appearance, with a copious precipitate.
9. When the water had been boiled for a few minutes, it was not changed by any of these precipitants, except the nitrat of silver.

FROM the first and second of these experiments, it appears that the water is impregnated with sulphurated hydrogen gas; the third shows that it contains no iron; the fourth and fifth indicate but a small quantity of carbonic acid. From the sixth,

it appears to contain no lime, and from the seventh no sulphuric acid. The eighth, however, discovers the muriatic acid, which we shall afterwards find is combined with soda.

10. By means of the pneumatic apparatus, which I described in a treatise I published some years since on the Crescent water at Harrowgate, nineteen cubic inches of permanently elastic fluid were procured from a wine gallon of the Moffat water, of which four were azotic gas, five carbonic acid gas, and ten sulphurated hydrogen gas.
11. A wine gallon of this water was evaporated very slowly to dryness, and 36 grains of *muriat of soda* (common salt) were obtained, some of the crystals of which were very distinct.

HENCE it may be concluded, that a wine gallon of the sulphureous water at Moffat contains,

Of muriat of soda	- - - - -	36	grains.
Sulphurated hydrogen gas	- -	10	} cubic inches.
Azotic gas	- - - - -	4	
Carbonic acid gas	- - - - -	5	

THIS water will not keep, for though closely corked up in bottles, in the course of two or three days it is found to have lost the whole of its sulphureous smell; it should therefore be used as soon after it is taken from the well as possible.

THE next water which I examined was the Hartfell spaw, which springs from the base of a high * mountain of that name, and is nearly five miles distant from Moffat. It is found at the bottom of a deep and narrow ravine, or linn, the sides of which are entirely laid bare to the very top, and form a very interesting object to the mineralogist, as all the different strata can be distinctly seen. These strata dip towards the bottom of the mountain, and are inclined to the horizon in an angle of about fifteen degrees.

THE lowest stratum is a black soft rock, which easily crumbles to pieces, and consists of clay, with great quantities of sulphuret of iron, and sulphuret of alumine; immediately above this stratum, which is several feet in thickness, lies another, consisting chiefly of argillaceous ironstone; above this, is another stratum of blackish shale, resembling the lowest; and above this, another of argillaceous ironstone of a fine deep red. The ascent up this ravine is very difficult; a small brook tumbles down it, forming some pretty cascades; and very near the foot of the linn is the mineral water, which seems to originate from water filtering through and dissolving the sulphats of iron and alumine of the rock, and in consequence of this, it is, contrary to most mineral waters, strongest after rains. The whole brook deposits an ochre, or oxid of iron, which colours the rocky channel to a considerable distance. Among the rocks above the spring, I found

* The summit of Hartfell, according to the measurement of Dr. Walker, is 3,000 feet above the village of Moffat, or 3,300 feet above the level of the sea.

some beautiful specimens of *alumen plumosum*, and a few green crystals of sulphat of iron.

IN these schistous strata, the sulphurets are decomposed by the action of the air, and the contact of water; the sulphur is converted into sulphuric acid, which, combining with the iron and alumine, form the sulphats; these being soluble in water, are washed away, filter among the crevices, and issue in the form of a spring, which is covered with a small building.

SOME shafts have been opened in this glen, probably with the hopes of finding lead or copper; about a quarter of a mile below the well, a shaft of considerable extent has been opened, in which are appearances of copper, though I have not heard that any considerable quantity of metal was found. It is, however, very reasonable to suppose, from the appearances of those hills, that they are rich in metallic veins.

THE latter part of the road, from Moffat to the Hartfell spaw, is very bad, and almost impassable even for a foot passenger.

THIS well was discovered in the year 1748, by John Williamson, an eccentric but benevolent character. He believed in the Pythagorean doctrine of the *metempsychosis*, or transmigration of the soul into the bodies of different animals; on this account he never tasted animal food for the last forty years of his life; nor would he suffer the smallest insect to be killed, if he could prevent it.

HE was buried in the old church-yard of Moffat, and by particular request, at as great a distance as possible from any other grave. A monument, in the form of an obelisk, was placed over his grave, by his friend and patron Sir George Clerk Maxwell; from the different sides of which I copied the following inscriptions :

On the West Side.

Sacred
To the Memory
of
JOHN WILLIAMSON,
who died
M.DCC.LXIX.

East Side.

Protector
of
All the Animal
Creation.

North Side.

The Discoverer
of
Hartfell Spaw.
M.DCC.XLVIII.

248 EXPERIMENTS ON THE HARTFELL WATER.

South Side.

His Life
was spent in
relieving
The Distressed.

Erected by his friends. M.DCC.LXXV.

THE water is perfectly clear when taken from the well, but gradually deposits, even though sealed up, a little oxid of iron, in the form of a fine impalpable sediment. It has a strong astringent taste, like ink.

THE following is the result of the experiments which I made with it:

1. Tincture of galls dropped into it, produced a colour nearly as black as ink, and this colour was as deep when the experiment was made after the water had been boiled, as it was before, which shows that the iron is not suspended by the carbonic, but by a fixed acid.
2. Muriat of barytes produced a white cloud, and a copious sediment.
3. Acid of sugar produced no change.
4. Acetite of lead produced a slight turbidness, with a white precipitate.
5. Tincture of turnsole was rendered a little red.
6. Lime water produced a slight turbidness, with some precipitate of alumine.

7. By means of the machine, only five cubic inches of gas were expelled from a wine gallon of the water, which was chiefly azotic gas.
8. A wine gallon of the Hartfell water was made to boil gently ; it soon became turbid, and deposited a brown powder, after which it was perfectly clear. The powder was collected by filtration, and found to weigh fifteen grains ; it was of a yellowish colour, but changed to a beautiful red on exposure to a considerable heat. It was found to be oxid of iron.

THE clear liquor was evaporated very gently to dryness, and the saline matter procured in this manner weighed 96 grains.

THIS was found to consist of sulphat of iron (sal martis) and sulphat of alumine (alum). In order to discover the respective quantities of each of these salts, the whole was dissolved in water, and the iron precipitated by tincture of galls. When this was separated, a solution of salt of tartar (carbonat of pot-ash) was added, which precipitated the alumine in a carbonated state, and from the quantity of carbonat of alumine, it was easy to calculate the sulphat of alumine, which I found to be twelve grains ; the quantity of sulphat of iron must therefore be 84 grains.

THIS water tastes much stronger after it has stood for two or three days, even in an open vessel, though it is in fact weaker, because it has lost part of its iron by standing. The sulphuric

acid losing part of its iron, its taste becomes more sensible, and the water approaches nearer to a solution of sal martis.

FROM the preceding experiments it appears, that a wine gallon of the Hartfell water contains,

Of Sulphat of iron	- - - -	84 grains.
Sulphat of alumine	- - -	12 ditto.
Azotic gas	- - - - -	5 cubic inches.

Together with fifteen grains of oxid of iron, with which the sulphuric acid seems to be supersaturated, and which it gradually deposits on exposure to the air, and almost immediately when boiled.

As the principal mineralizers of this water are the sulphats of iron and alumine, it is evident that, if well corked, it will keep for months, and perhaps years, unimpaired in its qualities; hence it may be carried to a distance better than most mineral waters, and its good effects need not be confined to Scotland, or even to Britain. When Dr. JOHNSTONE had the care of it, he sent it to many towns in England, and to the West Indies; but it is now in hands that render it of little benefit to the public. As it keeps so well, it is not necessary to drink it on the spot, which would be very inconvenient, but it may be procured in Moffat in a fresh state. It very much resembles the water of the Horley Green Spa near Halifax, of which I published an analysis in 1790, only the Horley Green water is considerably stronger.

WHILE rambling about Moffat, I observed a spring near the further Annan bridge, at the end of the town, beyond the manse, on the Dumfries road, which appeared to be a chalybeate. On tasting it, I found it strongly resembled the chalybeates at High Harrowgate; I therefore made some experiments with it, of which the following are the results:

1. Tincture of galls produced a beautiful purple colour; but not after the water had been boiled.
2. Lime water produced a slight cloud.
3. Muriate of barytes caused no change.
4. Acid of sugar produced no effect.
5. Tincture of turnsole caused a slight redness.
6. Acetite of lead produced no effect.

THESE experiments convinced me of its resemblance to the Harrowgate chalybeates, in which the iron is suspended by carbonic acid, as is evidently the case here.

I NEXT expelled the gas by means of the machine, which amounted to 17 cubic inches, of which 13 were carbonic acid gas, and three azotic gas.

A WINE gallon of the water was next made to boil gently for a quarter of an hour, during which time it deposited a quantity of yellow sediment, which, being collected by filtration, weighed two grains, and was evidently oxid of iron. The clear

liquor which remained after filtration, was not affected by any of the above tests.

HENCE a wine gallon of this water contains,

Of Oxid of iron	- - - -	2 grains.
Carbonic acid gas	- -	13 cubic inches.
Azotic gas	- - -	3 ditto.

THE quantities of iron and carbonic acid, which are the only substances of any consequence, are very nearly equal to those in the chalybeates of Harrowgate. From this circumstance, it cannot be doubted, that if this well were properly inclosed, which I was promised should be done, it would be a valuable addition to Moffat: it would agree with many constitutions in which the Hartfell water is improper, on account of its too great astringency and tonic power; and its vicinity to Moffat is a great advantage, as it can be drank on the spot by those who resort to this watering place.

HAVING finished what observations I had to make on the chemical properties of the mineral waters in the neighbourhood of Moffat, I shall beg leave to lay before my readers an account of their medicinal virtues, which was communicated to me by Dr. Johnstone, a judicious practitioner, who has resided at Moffat more than thirty years, and who is consequently well qualified to give information on this head.

“THE water which has been used as a medicine for the greatest length of time, is what is generally called the *Moffat well*, or *sulphur water*, which has been a place of resort for invalids for more than 150 years, and will continue to be so, not only from its medicinal powers, but also from the very dry, healthy, and romantic situation of Moffat. We have different traditions respecting its discovery, which are of little consequence; but I have reason to believe that it was first ordered to be cleared out by a lady of the name of WHITEFORD, who married a gentleman in this neighbourhood, and who had been cured of some complaint by this water, after having ineffectually tried others. The first notice of it in print that I know of, was by MATTHEW MAC KAIE of Edinburgh, who gave a chemical and medicinal account of it in 1659, and mentions its having been discovered some years before. Mr. MILLIGAN, a surgeon here about fifty years ago, gave an account of it, which may be seen in the Edinburgh Medical Essays.

“ITS effects have been long noticed in scrophulous, and herpetic or scorbutic cases. In scrophula its good effects are very observable, either when the glands or the bones are affected. If used in an early stage, before humour is formed in the glands, it most commonly discusses the swelling; and if the humour be formed, it promotes suppuration; so that taken in the stage in which the constitution is not much affected, it seldom fails to make a cure. When the bones are affected the cure is more obstinate, though its effect in promoting the exfoliation of

carious bones seems considerable. I have seen some instances of whole bones being cast off piece by piece. We have had many instances of white swellings of the knee being cured, if taken before the bones were much corroded or enlarged, and even afterwards, attended with great exfoliations. I saw one instance lately in this neighbourhood, where a number of pieces of bone were cast off, and though the joint remains stiff, the man is able to follow a laborious employment.

“ IN most kinds of what is generally called scurvy, whether in the form of herpetic eruptions, or cutaneous ulcers, or periodical erysipelatous eruptions, pimples in the face, or inflammations of the eyes, the salutary effects of this water have long been experienced. Since the time of its discovery it has been so noted for the cure of these diseases, as to deter others, labouring under other complaints in which it might have been equally beneficial, from visiting Moffat, because they dreaded the stigma generally affixed to persons resorting to this place. But this prejudice has long been got the better of, and these kind of patients now make only a small portion of our visitants.

“ IT has been successfully used in rheumatic cases, even where the limbs are stiffened and contracted. I have seen several instances of gentlemen from the East and West Indies, with liver complaints, who have attributed their cure to the use of it: it acts very powerfully as a diuretic, by which quality it clears the ureters, forces off gravel, and even substances of considerable size

from the bladder. I have some in my possession nearly the size of a field bean, which were forced down the urethra; it is not long since its use in bilious complaints began to be known. These complaints are sometimes constitutional, but are most commonly the result of intemperance, or a sedentary life: the commonly symptoms are colics, vomitings, want of appetite, indigestion, costiveness, flatulency, and heart-burn. When properly administered, this water not only alleviates, but frequently removes these symptoms. It is equally efficacious where there is a deficiency in any of the natural secretions, and in some cases where the constitution is greatly reduced, either from an original fault or lingering illness. We must, however, except consumptive complaints, in which the symptoms seem generally to be aggravated during a residence here.

“ THE water is so gentle in its operation, that the most delicate may use it with great safety and benefit.

“ I FEAR I shall scarcely be credited, when I assert as a fact, that a man drank in one morning sixteen Scots pints of it, without any other inconvenience than a little giddiness. I have known persons for months together drink from five to eight bottles of it every morning: indeed it is very common among the lower class to drink from three to six bottles, and I do not recollect that any have materially suffered by it. The quantity usually prescribed is from one to three bottles drank in the morning at the well.

“ BESIDES the benefit derived from drinking, the bath has its share of merit. In many cases I have seen the warm bath highly useful; the mineral seems to be absorbed, it being a fact well known, that not only the clothes, but the breath of those who bathe, have the sulphureous odour of the water. It should be used as a warm bath in all cases where there are ulcers or eruptions of any kind, whether scrophulous or scorbutic; and in cases of chronic rheumatism and paralysis. Every house has conveniencies for bathing on very reasonable terms.

“ The Hartfell water is a very powerful chalybeate, and requires particular attention, as well as judgment, in taking it up: it often happens, that for many months together it cannot be got in perfection, being only good after rain, and best of all when heavy rains have succeeded dry weather. Owing to these and other particular circumstances, this water has never obtained that celebrity to which it is justly entitled. Immediately after it was discovered, Dr. HORSEBURGH made some experiments with it, and published a few cases in which it had been used with success. His paper is inserted in the first volume of the Edinburgh Essays and Observations, Physical and Literary.

“ As it is a very powerful tonic, we should expect that it would be useful in diseases of weakness. I have likewise known many instances of its particular good effects in coughs proceeding from phlegm, spitting of blood, and sweatings: in stomach complaints, attended with head-achs, giddiness, heart-burn, vomiting, indi-

gestion, flatulency, and habitual costiveness; in gouty complaints affecting the stomach and bowels; in obstructions and diseases peculiar to the female sex. It has likewise been used externally with great advantage in tetterous eruptions, and old obstinate ulcers.

“As the water is very powerful it is generally drank in small quantities, seldom exceeding an English pint a-day, though in some cases I have prescribed twice that quantity. A few years ago a gentleman from England, afflicted with very bad stomach complaints, after trying a variety of mineral waters without advantage, came to make trial of the Hartfell spaw, and for six weeks drank a Scotch pint of it daily, which completely cured him. As this is much more than the quantity that patients can generally bear, it should be observed, that he had been in the habit for years before of drinking mineral waters freely.

“WITH respect to the new chalybeate, on which you made some experiments, I can as yet say little; but from its nature, it must be a very valuable acquisition to Moffat, and will, I think, answer in some cases where the other waters will not.”

THERE are many pleasant rides about Moffat, and some scenes in the neighbourhood by no means destitute of beauty and sublimity, which are frequently visited by the company; among these may be mentioned *Belle Craig*, situated at a short

distance from the Carlisle road, a romantic and sequestered spot, which will scarcely fail to repay the trouble of a visit.

LEAVING Moffat early one fine morning, we took the Carlisle road, and at the distance of about a mile and a half from the village, passed Dumcrief, the property of Dr. CURRIE of Liverpool, delightfully situated and surrounded by extensive plantations. The river Moffat runs through the midst of the grounds, and a branch of it being separated to turn a mill, insulates the garden. Proceeding along the Carlisle road, about a mile and a half beyond Dumcrief, we observed the conflux of three rivers, the Moffat, the Annan, and the Evan. These united streams take the name of Annan, though before their junction the Annan was the least of the three. As we proceeded, the extensive valley, flat and even like a lake, surrounded by hills, with the beautiful river meandering through it, attracted our attention. Indeed, the most superficial observer must be convinced that this valley has formerly been covered with water, which having gradually worn down the natural dam or boundary at its lower part, has subsided and retired to its present course. This natural dam is very visible from a small bridge in the road, a little beyond the third mile-stone: the mound has evidently the appearance of having been worn away in the middle, and forms a scene by no means unpicturesque.

ABOUT two hundred yards beyond the third mile-stone we left the high road, and ascended a kind of path on the right,

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Engraved by W. J. H. Wood

Drawn by W. J. H. Wood

Belle Craig

which conducted us over a hill to the entrance of a glen skirted with wood. Through this wood we descended by a path not very distinct, to a little brook, which we crossed, and proceeded along a road by the side of another small brook: at this place the glen begins to contract, and its steep sides are covered with wood to the very top: on walking about a hundred yards, we came to a scene highly picturesque. On our right, a fine rugged rock, crowned with oaks, and whose face was covered with a lichen of a beautiful whiteness, mixed with heath and shrubs, rises perpendicular from the bottom of the glen, and threatens destruction to those who venture near its base. The remainder of the contracted view towards the left, is bounded by a concave precipice, almost covered with wood, there being only a few places where the bare rock overlooks the shrubs and trees. In one place a small but beautiful cascade descends from the top of a rock on the left, to join the brook below.

It is the white rock on the right, that rears its venerable front so high, which is called Belle Craig, and which, I suppose, means bald rock, *beld craig* being the provincial appellation for a bald rock. Some have supposed that the picturesque beauty of this rock acquired it the name of Belle Craig. •

WHEN we had passed this beautiful and sequestered scene, the glen contracted very fast, its high perpendicular walls approaching nearer and nearer, till they were only a few feet asunder; here we had another view of the cascade which has been men-

tioned, and which appears to consist of several different parts, its stream being here and there hid from the eye by shrubs. On going a little further, the valley became so narrow, that there was scarcely room for a foot-path between the perpendicular rock and the brook. It soon afterwards widens a little, and on the left hand is to be seen a little projecting rock, from which water is continually dripping. This little weeping rock, which is a humble miniature resemblance of that at Knaresborough in Yorkshire, is by no means destitute of beauty, and the drops form a vivid and beautiful rainbow, if properly viewed when the sun shines. We next descended a few rude steps hewn out of the rock, and soon came to the boundary, where the brook fills up the whole width of the glen. This is generally the *ne plus ultra* of the visitants, it being difficult to proceed further; but those who do not fear being wet, go up the brook, which has worn a deep channel in the rock, down which it tumbles, forming a very fine cascade.

It was once the intention of some gentlemen fond of picturesque scenery, to have conducted the brook over the top of the rock, nearly opposite to the stone steps just mentioned, which would have had a very fine effect. This romantic little spot bears a great resemblance to Hackfall, near Rippon in Yorkshire.

In the vicinity of Moffat is a very fine cascade, frequently visited by the company, called the Grey Mare's Tail.

To see this cascade we went nearly half a mile from Moffat, on the Carlisle road, and then turning to the left, ascended a hill called Craigy hill, which is part of Dr. Currie's estate, and from which we had a fine view of the venerable woods of Dumcrief. Following the road to Selkirk, we crossed a small impetuous brook, with a very rocky channel, called Craigy-burn, and soon entered a fine glen beautifully wooded. This wood, which consists chiefly of hazel and birch, is called Craigy-burn-wood. In the midst of a flat and fertile but narrow vale, the Moffat winds its serpentine course. The other side of the river was formerly wooded, which, no doubt, added much to the beauty of the scenery; but the wood having been cut down, and no attention afterwards paid to it by the owner, this ornament of the country is lost.

WHEN we had passed Craigy-burn-wood, we had a full view of the romantic glen, bounded by lofty hills, frowning like the surly sentinels of the legion posted behind them. A ride more romantic than this, on a fine day, can scarcely be imagined. After riding by the side of the Moffat about seven miles, we crossed it, and ascending the hill on the other side, had a full view of the cascade we were in search of. Here the water precipitating itself from rock to rock, dashing, foaming, and thundering from a great height, between two steep hills, falls into a dark pool, from whence it runs with less impetuosity to augment the waters of the Moffat, which it joins a little above the place where we crossed the stream. The water, by its precipitous fall, is broken by the air, so as to appear as white as snow.

THE water which forms this cascade runs from a lake on the top of the hill, about three quarters of a mile distant from the highest part of the fall. This lake, which is called Loch Skeen, is 1,100 yards in length, and about 400 in breadth; there is a little island where eagles bring out their young in great safety, as the water is deep, and there is no boat on the lake. The water of this lake abounds with very fine trout.

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George Buchanan.

*From an original Painting in the Museum
of Anderson's Institution, Glasgow.*

APPENDIX.

GEORGE BUCHANNAN.

THIS writer, who was distinguished in the sixteenth century as a poet, historian, and man of universal genius, was descended from an ancient family, which was never rich, but by the extravagance of his grandfather was reduced to great indigence. His mother's brother saw that he had genius, and sent him to Paris for his education; but in less than two years the death of his uncle, and his own bad state of health, obliged him to return home. He then became a soldier under JOHN Duke of ALBANY; and the severity of the campaign brought on a disease which confined him to his bed during the whole of the next winter. While struggling with poverty and sickness, he was, at the age of twenty years, admitted into the college of St. Barbe in Paris, where he taught grammar for three years, and became acquainted with the Earl of CASSILS, who was so delighted with his wit and manners, that he made him his companion and tutor. With him he remained five years abroad, and two years at home;

at the end of which the Earl died, and he was about to return to France, when JAMES the Fifth made him preceptor to his illegitimate son, who was afterwards the famous Regent MURRAY. While he was in this situation, there was a conspiracy against the king, who, believing the Franciscans to be concerned in it, ordered BUCHANNAN to write against them. He did so, but in such gentle terms that the King was dissatisfied, and commanded him to write with more severity. The second order produced the famous *Franciscanus*, of which only one copy was given to the King, who let other persons see it, and it would seem in a dishonourable manner; for it soon became public, and BUCHANNAN found the animosity of the church more powerful than the favour of the crown.* Cardinal BEATON offered a sum of money for his head; and the prosecution of him became a common cause, not only to mendicants, but to ecclesiastics of every kind. He was imprisoned, and would have been tried, had he not escaped from his keepers. When he arrived in Paris, he found BEATON there as ambassador to that court. This induced him immediately to quit that city for Bourdeaux, where he taught in the public schools for three years. BEATON found him out, and would have had him tried in France, if the affairs in Scotland had not put an end to his embassy.

* This poem consists of 936 lines: it is a satire upon the Franciscans, or monks of the order of St. Francis, who in France were called Cordeliers, from the cords with which they were girt. A Franciscan is supposed by the poet to converse with his brethren, and to instruct novices; in doing which, he displays all the abominable principles and practices with which that order has been charged.

FROM Bourdeaux, after inspecting the education of the celebrated MONTAIGNE, he went to Paris, and taught the second class in the college of Bourbon. In the year 1547, he went to Portugal, in order to teach philosophy and polite learning; and he says that he did so, because his companions were rather familiar friends than strangers, and because that corner of the world appeared to him most likely to be free from tumults. He was happy in that country for some time; but when his friend GOVEANUS died, he was imprisoned, first in the Inquisition,* and afterwards in a monastery. At last he obtained his liberty, and was made tutor to the son of Mareschal BRISAC, with whom he spent five years in France and Italy. He returned to Scotland in the same year that Protestantism became the established religion of that country. He was made principal of St. Leonard's college in St. Andrew's, and was elected moderator of the general assembly of the church, an office of great importance at that time, and which has never been conferred upon a layman but in that instance only. He was appointed preceptor to the young king by the authority of parliament. He was one of the commissioners to York, and afterwards to Hampton Court, upon the

* When Buchannan was accused in Portugal, the first charge against him was, That he had written the Franciscanus: the second, That he had eaten flesh in Lent; and the third, That he had no good opinion of the Romish religion. To the first he answered, That before he left France he had sent an account of that affair to the king of Portugal, and that he had given but one copy of that poem to the king of Scotland, by whose order it was written. His own words are, "Unum enim ejus exemplum, Regi Scotorum, qui scribendi auctor fuerat, erat datum."

affairs of Queen MARY; and at his return he was made director of Chancery, and pensioner of the cross regal in Ayrshire. Honours were heaped upon him, even after the death of his great friend the Regent MURRAY; for he was made one of the lords of council, and lord privy-seal. He retired from court about a year before his death, and died a bachelor in December, 1582, in the seventy-sixth year of his age.

THERE has scarcely existed a distinguished person in public life, whose moral character has not been calumniated through envy or other motives. BUCHANNAN'S was attacked with great virulence. The injustice of the attack is, however, pretty certain, because no other proof has been brought than vague assertions, and the chain of facts just enumerated form the strongest evidence of his probity and merit. The only circumstance which has not been well explained, is, how he fell into such poverty, that he was buried at the expense of the city of Edinburgh. The offices which he held in Scotland, during the latter part of his life, were lucrative; I cannot therefore see how he became so indigent, but by supposing that he gave away his money in charity. This seems the more probable, because in all the calumnies that were thrown out against him, he is not so much as charged with extravagance; because prodigality is seldom the vice of old age; and because, when he was near his end, he desired his servant to give to the poor what little money was in his purse, as there was not enough to defray the expenses of

his funeral; saying, "that if they will not bury my corpse, they may let it lie where I am, or they may throw it where they please."

ANOTHER charge which has been urged against BUCHANNAN as a writer, is indelicacy and licentiousness, particularly in his description of an amorous Franciscan in his poem *Franciscanus*: but he may perhaps be defended when we compare the delicate taste of the present age with that in which he wrote. The ancient satirists, as Hume observes, often used great liberties in their expressions; but their freedom no more resembles the licentiousness of ROCHESTER, than the nakedness of an Indian does that of a common prostitute.* In the twelfth and fourteenth centuries, when the church of Rome was in the height of her glory, there was a settled enmity between the priests of the same church, viz. the seculars and regulars, or parish priests and monks, because their manners and interests were in some respects different. The art of printing and copper-plate engraving was unknown at that time; and the seculars, who were in possession of the cathedrals, which were then the places of greatest resort, made satirical statues and figures of the monks, instead of lampooning them, as would be done in our times, by prints and pamphlets. In several cathedrals, for instance that of Glasgow, there are still remaining many figures of the monks in more indecent situations than any described by BUCHANNAN; so that he, in fact, said no more against them than was com-

* Hume's History of James II.

monly done by their brother ecclesiastics. These figures, which are to be found in the cathedrals of most countries in Europe, present a striking view of human nature. In the opinion of good catholics, every stone in a religious building is holy in the strictest sense; while protestants think there is nothing more sacred in the *stones* of a church than in those of any public edifice; and yet the first applied their holy fabrics to a use, of which a protestant would be ashamed. So different are the manners of mankind in different ages, and so wonderfully does the human mind reconcile the greatest inconsistencies when the malevolent passions are afloat, and fanned by party zeal.

IN the Life of BUCHANNAN, written by himself, there is a dignity, good humour, modesty, and knowledge of the world, which stand forth as a reproach to almost all other self-biographers. Though he was oppressed with years and disease when he wrote it; and though the clergy had persecuted him for a long time, and zealously sought his life, yet he speaks of them in the following terms: "They, to wit the Franciscans, who make a profession of gentleness, took that slight offence more amiss than seemed becoming in them, who were so pious in the opinion of the vulgar; and not finding sufficient cause to justify their immoderate anger, they had recourse to their common charge, to wit, that of heresy." When he speaks of the persecution which he and his colleagues met with in Portugal, it is in this manner: "All their enemies, and all their rivals, first secretly, and then openly, fell upon them in the most hostile

manner; and they insulted BUCHANNAN with the utmost bitterness; for he was a stranger who had few to rejoice in his safety, to lament his distress, or to revenge his injury." When speaking of the monastery in which he was imprisoned, he says: "That though the monks who were appointed to instruct him were extremely ignorant in religion, yet they were neither inhuman nor wicked." It is remarkable that this cruel treatment did not deprive him of tranquillity of mind; for, during his confinement, he employed his time in writing the translation of the Psalms of David, which has been admired in every country. He was so far from assuming great importance on account of his literary fame, that when he speaks of himself it is in this manner: "The judges, who had tired themselves and him for half a year, shut him up in a monastery, that it might not be thought they had without cause harassed a man who was not unknown." And this it was proper for him to mention, because, without it, no just account could be given of his imprisonment after his trial.

WHETHER we consider BUCHANNAN as a poet or historian, he must be allowed to have possessed very uncommon abilities. The Franciscanus alone would have raised him to great eminence as a poet, for there is hardly any satire of the same length that is so poignant, correct, and elegant. The style is nervous, and so much elevated, that some critics have spoken of it as too heroic for a satire: but this circumstance, like the style of *Lutrin*, or

the Rape of the Lock, by exciting ridicule produces contempt; while it by no means diminishes the abhorrence which is due to such crimes. BUCHANNAN wrote a great variety of little poems, and many of them have so much of the epigrammatic point, that the reader must be both surprised and pleased to see that the same author possessed likewise so much of the true elegiac vein as in his "Illa mihi semper presenti dura Neæra," so much of the ancient simplicity as in Jephthes and Baptiste; and so much of the most elevated sublime, as in his Sphæra, and in his Paraphrase of the Psalms of David.

WHEN we take a view of BUCHANNAN as an historian, it may be proper to observe, that no history will ever be valuable for the composition, that does not exhibit either philosophic views of human nature, or beautiful pictures of interesting events. In both characters the merit of BUCHANNAN is conspicuous. The outlines, for instance, of the excellent Treatises concerning Crimes and Punishments, are contained in BUCHANNAN'S short remarks upon the tortures that were inflicted upon the murderers of JAMES the First.* And his account of the taking of Dumbarton Castle by CRAUFURD, is a more striking picture of

* Hoc maxime pacto, mors Jacobi, crudelis quidem illa, sed certe ultra humanitatis modum crudeliter vindicata est. Hujus enim generis supplicia vulgi animos non tam à sævitia metu avocant, quam ad quidvis agendum et patiendum, efferant; nec acerbitate tam pravos deterrent, quam assuetudine spectandi terrorem pœnarum imminuunt: presertim si facinosorum animi adversus vim doloris induruerint: apud vulgus enim imperitum, confidentia pertinax constantis fiducia plerumque laudem accipit.

an interesting event, than any that has since been made of it by very able writers. His history has been much read and admired by foreigners,* as well as by his own countrymen.

It must be acknowledged, that there are some things in his history which are inaccurate, and others which are false; but before he be condemned for them, the following circumstances ought to be considered: First; his inaccuracies have been discovered in consequence of examining evidence to which he had not access. Second; in his ancient history he followed what he thought to be the best accounts of other writers, and only gave them a classic dress. The modern cry, therefore, that the Ancient History of Scotland is fabulous, can never be a just charge against him; for if he had not related what was handed down to him, or if he had been a sceptic without the evidence of records, he would not have been an historian, but a writer of romance. Thirdly, the rage of civil and religious party was so

* "The style," says La Clerc, "is beautiful and pure; and he appears every where to speak the truth as far as it was known to him. His judgment of things is sound; he censures freely what deserves it, and commends what he thought worthy of praise. He unites the brevity of Sallust with the elegance and perspicuity of Livy. But he is not sufficiently exact in his dates, and does not cite his authorities."

Thuanus says of him, "That though Buchannan, according to the genius of his nation, sometimes inveighs against crowned heads with severity, yet that his history is written with so much purity, spirit, and judgment, that it does not appear to be the production of a man who had passed his days in the dust of a school, but of one who had always been conversant in the most important affairs of state. Such," says he, "was the greatness of his mind, and the felicity of his genius, that the meanness of his fortune did not hinder him from forming just sentiments concerning things of the greatest moment."

violent in his own time, that it was often impossible to know the truth; and yet his general account of disputed events appears, to the most candid and best informed in modern times, to be well founded. If he had not the means of knowing the truth exactly, we may lament his situation, but cannot blame his integrity, or cease to admire the purity, the vigour, and the elegance of his style.

UPON the whole; after making every just allowance for the shades in BUCHANNAN'S character, he must be considered, by every impartial reader, as one of the most illustrious persons which this island has produced; and there is hardly perhaps another nation that can give an example of the powers of writing prose and verse united in the same man in so distinguished a manner.*

* For the materials of this Appendix, I am indebted to a MS. paper written by the late Professor Anderson, and read before the Literary Society in Glasgow College.

ITINERARY.

FROM Glasgow	MILES.
to Dumbarton - - - - -	15
Luss - - - - -	12
Inveruglas - - - - -	4
Arroquhar - - - - -	6
rest and be thankful - - - - -	7
Cairndow - - - - -	6, 13
Inverary - - - - -	10
Dalmally - - - - -	16
Taynuilt - - - - -	14
Oban - - - - -	15
Ferry to Kerrera - - - - -	2
Across the island of Kerrera - - - - -	2
From Kerrera to Achnacraig, Mull - - - - -	10
Aros - - - - -	18
Torloisk - - - - -	15
Staffa - - - - -	12
Icolmkill - - - - -	10
Torloisk - - - - -	20

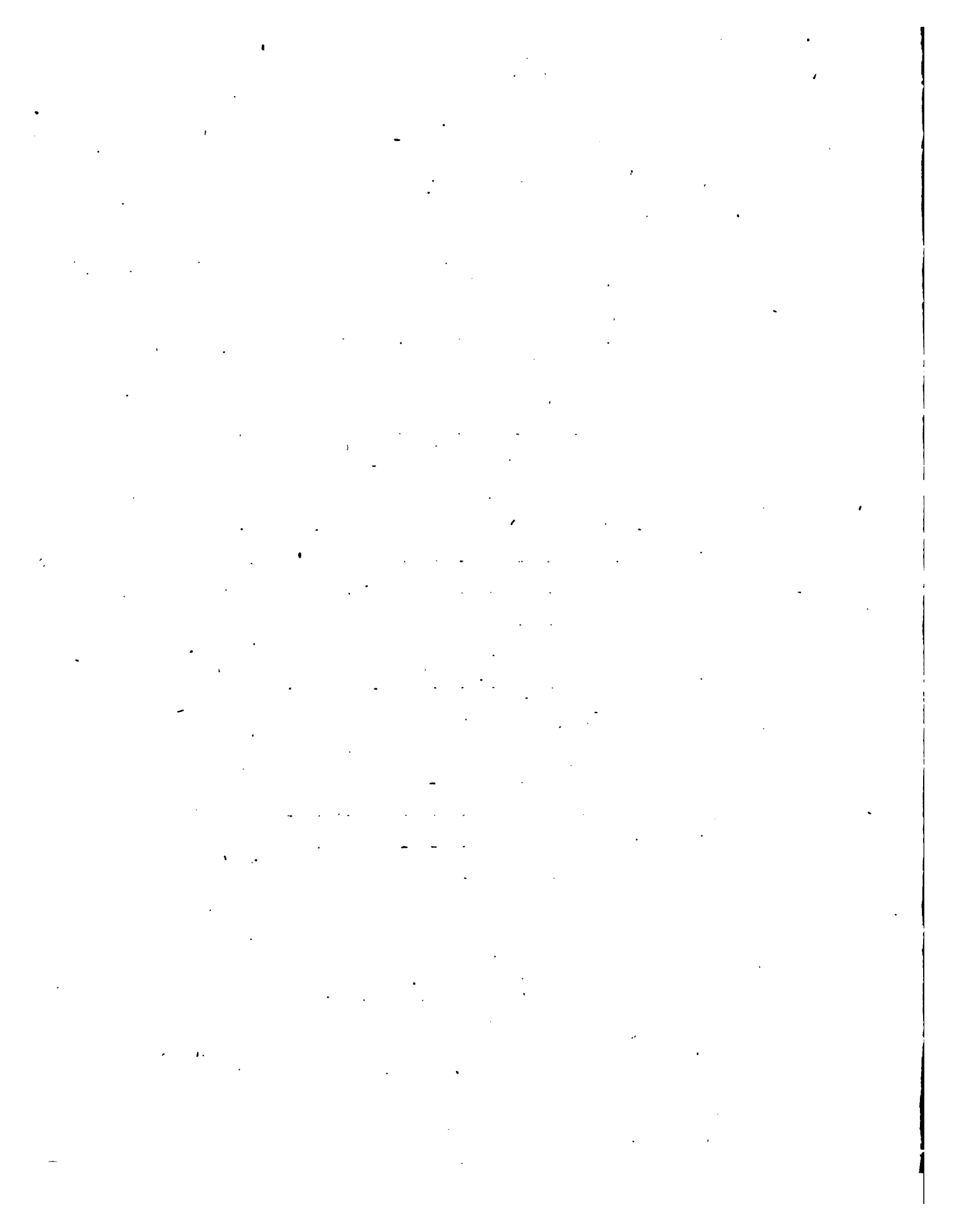
ITINERARY.

	MILES.
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Achnacraig - - - - -	18
Kerrera - - - - -	10
Oban - - - - -	4
Connel Ferry - - - - -	4
Shean Ferry - - - - -	4
Portnacraish - - - - -	4½
Ballachellish - - - - -	10
Glencoe - - - - -	6
Ballachellish to Fort William - - - - -	14
Letter Findlay - - - - -	15
Fort Augustus - - - - -	14
General's Hut - - - - -	14
Inverness - - - - -	18
Freeburn Inn - - - - -	15
Avimore - - - - -	15
Pitmain - - - - -	13
Dalwhinnie - - - - -	13
Dalnacardoch - - - - -	13
Bruir - - - - -	6½
Blair - - - - -	4
Garry Bridge - - - - -	4
Falls of Tummel - - - - -	1½
Dunkeld - - - - -	20
Balnagarde - - - - -	10
Aberfeldie - - - - -	8
Kenmore - - - - -	6

ITINERARY.

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	MILES.
Logierait - - - - -	18
Dunkeld across the Tummel - - - - -	9
Perth - - - - -	15
Scone - - - - -	2
From Perth to Kinross - - - - -	15
Caldron Linn - - - - -	8
Dollar - - - - -	5
Stirling - - - - -	12
Doune - - - - -	8
Callander - - - - -	8
Trosachs - - - - -	10
From Callander to Lake of Monteath - - - - -	6
Fintry - - - - -	10
Campsie - - - - -	8
Glasgow - - - - -	9
Hamilton - - - - -	11
Lanark - - - - -	13
Douglas Mill - - - - -	12
Elvan Foot - - - - -	13
Moffat - - - - -	13
Lockerby - - - - -	16
Gretna Green - - - - -	16
Carlisle - - - - -	14



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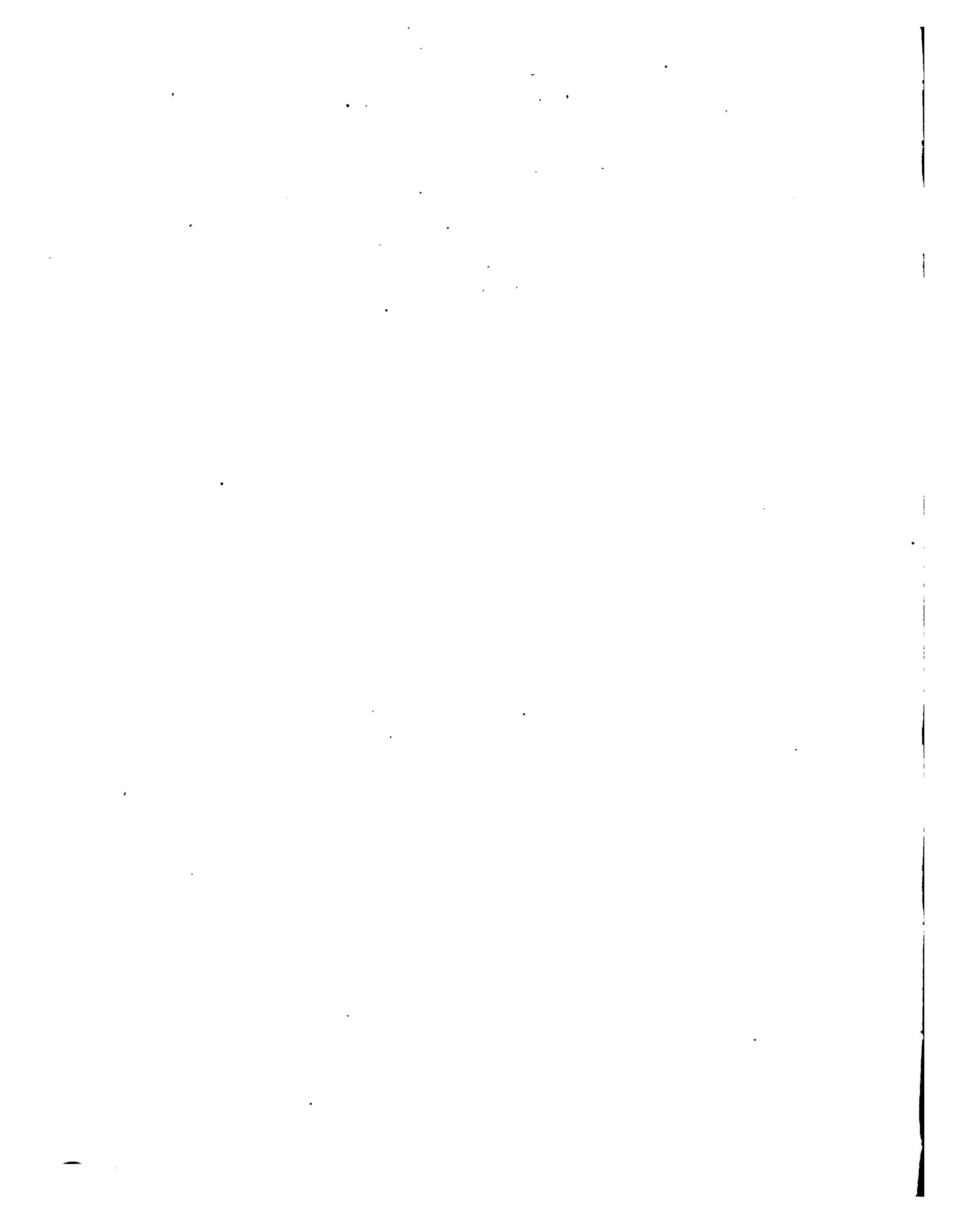
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