



Notices of the proceedings at the meetings of the members of the Royal Institution of Great Britain with abstracts of the discourses delivered at the evening meetings

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WEEKLY EVENING MEETING,

Friday, February 8, 1867.

SIR HENRY HOLLAND, Bart. M.D. D.C.L. F.R.S. President, in the Chair.

The REV. FREDERIC W. FARRAR, M.A. F.R.S.

On some Defects in Public School Education.

When I had the honour of being invited to deliver a discourse before the Royal Institution, my subject was at the same time assigned to me. Yet even if this had not been the case, it would perhaps have been unnecessary to apologise for speaking to you on a topic of great importance, of which I know so much from personal experience. Although, therefore, my discourse must be of an interest immeasurably inferior to those fairy tales of science, illustrated by delicate and wonderful experiments, to which you are accustomed in this place, it

will, at least, be so far scientific in its spirit, that it will deal with no facts which have not been derived from first-hand observation.

Thirteen full years of labour spent in the heart of Public Schools, and devoted, to the utmost of my poor ability, to their service, are the credentials which I offer to save me from the charge of presumption if I deal with their shortcomings. My position differs widely—nay, absolutely-from that of a rude, uncompromising, and unsympathetic assailant. The fact that I have myself toiled for years at a task which, in many instances, has filled me with the misgiving that it would be as barren of all obvious results as if I had ploughed the sand of the sea-shore and sown salt in its furrows, will show, I trust, that I am no arrogant critic with an eye blind to every merit, but keen as that of an eagle to every fault. Honouring the body of public schoolmasters with a sincere honour,—believing that, though their usefulness is often impaired by the trammels of an unprofitable routine, there may be found among them men of conscience the most enlightened, of intellect at once solid and brilliant, of indomitable energy and noble purpose,—I can hardly be suspected of desiring to cast a slur on a profession, to which, however lightly it may be estimated by the outer world, it is my pride and pleasure to belong. If, then, a hand so feeble as mine can inflict the slightest wound on our present system, I ask to be believed when I say that it is the faithful wound of a friend, and that my spear, like the spear of Achilles, is meant to heal as well as smite. If I criticize Public Schools fearlessly, it is because I love them deeply, and because I would not willingly see them fall into that gradual neglect and disesteem, which must be the consequence of a refusal on their part to progress with a progressive age, and to widen the narrow horizon of their studies with the widening of an epoch, whose researches have thrown light on every region of nature, from its minutest organism to its most distant nebulæ and stars.

Not, then, from any wish to conciliate favour for my future remarks, still less because I shrink from the full brunt of any anger they may bring upon me, let me say as the hearty tribute of my genuine admiration, that judged by the nobility and serviceableness of the manhood they have trained, the Public Schools have no cause to blush; and that though they may have fallen far short of that splendid ideal which is entertained for them in the aspirations of those who love them best, they may yet put forth an irrefragable claim to the respect and honour of their bitterest enemies:—

"Great men have been among them,—hands that penned, And tongues that uttered wisdom."

And although they have no right to claim the entire credit of such names, because the greatest men are often the accidents rather than the results of a system, and they have often been great in spite of it rather than because of it, yet, when a school (like that which I have at this moment the honour to serve) may boast to have produced in one

half-century among its five Prime Ministers, a Palmerston, a Peel, a Spencer Percival, and an Aberdeen; and among its statesmen, a Dalhousie and a Sidney Herbert; and among its soldiers and sailors, a Rodney and a Codrington; and among its poets, a Byron and a Proctor; and among its scholars, a Parr and a Sir William Jones; and among its divines, a Trench and a Manning; and among its common crowd of unknown alumni, so vast a multitude of honourable and useful men;—such a school (and it is but an illustrious type of many more) has no cause to fear that a system which, in other days, has borne "such fruit in all its branches," will be hastily or indis-

criminately condemned.

1. To proceed, then, to my review of our present system in its workings and results, I would state my belief that the social education offered by our schools is one of immense value. I am not now alluding to the despicable advantage of making fashionable acquaintances, but to something much deeper and more indisputable. It is, I think, a distinct benefit to the growth and development of English society, that boys of families and of professions the most widely diverse, should be thrown together at our Public Schools. It is a benefit, I think, to the harmony and to the breadth of our statesmanship, that the poor curate working obscurely in his remote country parish, and the brilliant journalist who wields the force of public opinion, and the college don in his quiet quadrangle, and the Manchester man building up his vast fortune in the counting-house, and the eloquent Radical member for some city or borough, and the silent millionaire nobleman who flings the whole weight of his influence on the side of Conservatism, should still have this friendly bond of sympathy between them, that at school they each found their own level or realized their own worth, and that one was the other's fag, and that they joined in shouting for the victory of their common house in the green and sunny cricket-field, and passed under the influence of the same associations and interests, and that, however widely they may now be separated, they loved and esteemed each other in those days as equals and friends. In broadening the views, in knitting together the sympathies of brother Englishmen, even amid such din of controversies and strife of parties as may be raging at this moment, or will soon be raging, within the walls of St. Stephen's, such ameliorating influences are not, I think, to be despised.

2. And, again, as far as regards moral education, I give my most sincere and honest opinion when I say we have good reason to be thankful. Be it remembered that we have to deal with a difficult and

impetuous period of life; with that perilous age-

"When young Dionysus seems
All joyous as he burst upon the East
A jocund and a welcome conqueror;
And Aphrodite sweet as from the sea
She rose, and floated in her pearly shell
A laughing girl."

Let any one consider how difficult must be the task of governing that wilful age, and then let him visit some great school, and note the admirable discipline, the cordial relations between master and scholar, the manly bearing, free at once from presumptuous forwardness and servile timidity; and then, further, the reverent attention to the religious services, and the number of hushed and youthful partakers of the Lord's Supper,—and few, I think, will refuse to admit that, by God's blessing, we have in large measure ennobled and purified the once unhealthy moral atmosphere of our Public Schools. Some, indeed, there are, and will ever be, who, in spite of the many kindly and solemn warnings they receive, learn there but few lessons save those of sin and sorrow; but the majority, by their high tone of honour and principle, and by that deeply encouraging growth of Christian character which marks their progress from form to form, show that the most high-spirited boys may be guided by a thread, when they are guided by gentlemen and by Christians, as well as by scholars, and when the sincere and simple spirit of religion is made to bear—not in the shape of dead dogmas, but in the shape of living principles—upon the whole tenour of their lives.

3. Nor-once more—if we turn to the physical training of our boys, shall we find any errors—at any rate on the side of omission. If the end and aim of physical training be health, vigour, and activity, few will think it neglected when they see the healthy colour, and high spirits, and well-knit frames, which among our Public School boys are not the exception, but the rule. The only question could be whether in this direction we have not gone too far. I would leave ample margin for our hours of play; I look with the heartiest sympathy on the flourishing of our manly sports; I know the value and beauty of a keen glance, a strong arm, and swift feet, and I rejoice to see the racquet-court, the cricket-field, and the rifle range thronged with emulous competitors; but I must not hesitate to say, that in some instances we have pushed our admiration for these things to extravagant and disastrous lengths. When we commonly see boys ready to sacrifice everything to cricket; when we see them devoting to it a number of hours and an amount of enthusiasm, out of all proportion to that expended on their work; when we find their thoughts so thoroughly coloured and moulded by it that they talk cricket, think cricket, and dream cricket, morning, noon, and night; it is hardly surprising to find many who complain that this mania of muscularity has its share in the hunger-bitten poverty of our intellectual results, and tends to account for the fact that the value of the work we get out of the mass of boys is, as Mr. Gladstone puts it, "scandalously small." Let us by all means make our boys good animals if we can; let us train them to patient endurance and hardy strength; let us teach them (if we can teach them) to scorn the ever-growing tendency to luxury and extravagance; but let us at the same time impress on them, that to be good

animals is a contemptible result if it does not conduce to their being

better, more thoughtful, and nobler men. It is hardly satisfactory that

the child of nineteen Christian centuries, "the heir of all the ages in the foremost files of time," should spend all his energies, and all his admiration on the attainment of those corporeal attributes in which, let

him do his best, the brute and the savage will beat him still.

4. I now turn to that part of my task which is at once the most difficult and the most immediately important—I mean the Intellectual Education of our Public Schools. And here I shall doubtless cut against the grain of a hundred prejudices, and draw upon my head a storm of opposition. Be it so, if I thereby hasten the victorious purpose which so many have at heart. About my own insignificance the storm may roar as loudly as it will, if thereby it "lash into motion those lazy clouds" that have stagnated so long on our educational horizon. Nor will I deprecate it further than by saying that no one has a right to resent the straightforward avowal of a conviction derived from long experience; and that, as I speak without arrogance and without censoriousness, I claim the privilege, as indeed I have earned

the right, to speak also with perfect plainness.

I must, then, avow my own deliberate opinion,—arrived at in the teeth of the strongest possible bias and prejudice in the opposite direction,—arrived at with the fullest possible knowledge of every single argument which may be urged on the other side, -I must avow my distinct conviction that our present system of exclusively classical education as a whole, and carried out as we do carry it out, is a deplorable failure. I say it, knowing that the words are strong words, but not without having considered them well; and I say it, because that system has been "weighed in the balances and found wanting." It is no epigram, but a simple fact to say, that Classical Education neglects all the powers of some minds, and some of the powers of all minds. In the case of the few it has a value, which being partial, is unsatisfactory; in the case of the vast multitude, it ends in utter and irremediable waste. On the theory of the convertibility of force, something, I suppose, must come of the energies expended on our ordinary teaching; but at present a large portion of them seems to me as entirely wasted, as the sunbeams which waste their vivifying influence in scorching the desert sands. "We pour this kind of knowledge," says Mr. Ruskin, "on one and all alike, like snow upon the Alps, and are proud if here and there a river descends from their crests into the valleys, forgetting that we have made the loaded hills themselves barren for ever."

The proofs of the fact are now but too patent in the faithful report of eminent and most friendly commissioners; for after diligent, anxious, and repeated study of the four thick blue volumes in which their laborious investigations lie buried from the public ken, I can draw from them no other conclusion than that which may be summed up in these few words: That but a small proportion of our boys, say twenty-five per cent., go to the Universities; that yet the entire curriculum of our Public Schools is framed with a view to the Universities; and that even of this poor twenty-five per cent., who are as

it were the very flower and fruit of the system, and if I may so phrase it, its raison d'être, a considerable number (many would be inclined to say the larger number) leave school at the age of eighteen or nineteen, not only ignorant of history, both ancient and modern, ignorant of geography and chronology, ignorant of every single modern language, ignorant of their own language and often of its mere spelling, ignorant of every single science, ignorant of the merest elements of geometry and mathematics, ignorant of music, ignorant of drawing, profoundly ignorant of that Greek and Latin to which the long ineffectual years of their aimless teaching have been professedly devoted; and we may add, besides all this, and perhaps worst of all, completely ignorant ofaltogether content with—their own astonishing and consummate ignorance. Or, in other words—for here I am but translating into a little plainer language the courteous euphemisms of the commissioners -we have this fact: During ten or twelve, or even more, of the best, the most vigorous, the most plastic, and the brightest years of life, a multitude of boys have been mainly, at some schools almost exclusively, occupied with Greek and Latin, who yet at the end of those years not only know nothing else, and not only are wholly careless to learn anything else, but have profited so little even in their Greek and Latin that they can neither write a single correct sentence in either language, nor stumble correctly through a single page of their simplest authors without special previous preparation. On such a topic it would be useless to amplify; there, whether we like it or not, is the plain, naked, unvarnished fact. If it startle us, I can only say it ought to startle us; if it is painful, I say that it ought to be painful to any mind on which custom is not lying with a weight "heavy as frost, and deep almost as death." If any one be prepared to question it, the Commissioners will supply him with ample proofs in both hands; and any public schoolmaster could quadruple those proofs, if his eyes are open, out of the experiences of a single year. The Commissioners quote tutor after tutor of the Oxford Colleges, and tutor after tutor of the Cambridge Colleges, who come forward with dreary iteration to say that the men are mostly men of excellent principles and manners, but to numbers of whom they freely apply the epithets "indolent," "unawakened," "inaccurate," "men of idle habits, and empty uncultivated minds." And this, be it remembered, is the verdict on boys who go to the University, the only body of whom the Commissioners had even an . opportunity of forming a judgment; and it suggests these two reflections:-If these be the results in the case of boys for whom the system was specially framed, what are we to think of the rest? And if these boys know nothing of Greek and Latin in which for years they have been assiduously taught, how unfathomable may be their ignorance in subjects which they have never been taught at all, or (as is the case with many noble branches of knowledge) taught by an ignorant tradition to neglect and to despise?

Facts like these may have been unknown to all but professional teachers at schools and universities until the Commission revealed

them, and until the whole press of the United Kingdom, whether friendly or unfriendly, whether religious, political, educational, or scientific, had with appalling unanimity summed up the general result of the Report of the Commissioners in the one ugly word, FAILURE. There was no escape from the plain conclusion; yet the apathy with which it was accepted strikes one with amazement. We know what the years of boyhood are-how keen, how inquiring, how full of life: we know what education can do; how it can stimulate exertion and store up knowledge, and give extraordinary energy to every faculty and every sense. Is it then a matter of no consequence that the intellectual powers of so many fine and noble English boys should be suffered to run to seed? Is it the will of England that her sons should grow up good oars, and good cricketers, and profoundly ignorant men? While science commands its thousands of eager, devoted, enthusiastic workers, will England remain content that the main effort of her education should end so often in an atrophy of intelligence and knowledge? Is education a mere trifling experiment made in corpore vili? Is the mighty development, the magnificent heritage of this and many centuries to be left with an influence either nil or insignificant in the teaching of our boys? If people believe in a classical education, do they believe in one which may be nominally classical, but which ends with such extreme frequency in a gigantic negation? Will they listen to idle and flourishing rhetoric about the graceful and godlike literature of Greece and Rome, and then deceive themselves with the illusion that this is the reward of lads who, after an indefinite term of years, could not speak two Latin sentences, or construe Xenophon without a crib? Are we, in the nineteenth century, to learn no more and to teach no more—nay, to attempt and to achieve actually less—than was learnt by young Romans in the school of Quintilian, or at best by Gregory and Basil in the retirement of Athens? The young Greek learnt something of geometry; the young Roman something of law; even the young monk of the Middle Ages learnt in his meagre quadrivium some scraps of such science as was then to be had. Are we alone to follow the example of the Chinese in a changeless imitation of our ancestors, and to confine our eager boys for ever between the blank walls of an ancient cemetery, which contains only the sepulchres of two dead tongues?

Such questions crowd indignantly upon the mind; and that they should admit of no answer is a subject of simple astonishment. If English people do not really care about the question—if they are indifferent to knowledge, scorn ideas, and despise Geist as a continental importation—then there is an end of the matter; but if, undeceived at length, they begin to realize that a solely classical education even for the few who succeed in it is not the best, while for the multitude who fail, it ends in no Latin, no Greek, and nothing else: then it is full time for their voice to be heard. The mighty stream of public opinion must be brought to bear upon universities and schools, and if they cannot be aided from within they must be coerced from without,

to modify a curriculum which has long been too narrow and antiquated, and is now demonstrably unsuccessful. In a scientific age their studies ought not to be solely literary: in a progressive, practical, and earnest age they must not be suffered to remain stationary, fantastic, and pre-

eminently pagan.

That Greek and Latin—taught in a shorter period, and in a more comprehensive manner—should remain as the solid basis of a liberal education, we are all (or nearly all) agreed: none can hold such an opinion more strongly than myself: but why can it not be frankly recognized that an education confined to Greek and Latin is a failure, because it is an anachronism? It has outlived its time. It is utterly out of harmony with the spirit of the age. It may have been all very well three centuries ago, but is it to remain unaltered after three centuries, which in the history of the human race have the importance of thirty? * This is an age of progress, and we keep spinning round and round on the same pivot; an age of observation and experiment, and we keep bowing and scraping to mere authority; an age, as Professor Huxley has said, "full of modern artillery, and we turn out our boys to do battle in it, equipped with the sword and shield of an ancient gladiator." Its continuance is due, not to its importance, but mainly, as the Commissioners admit, to custom and prescription; and now the new wine is bursting the old bottles. The days when men were grateful to a literature which had unshackled them from the fetters of scholasticism—that heroic age of classical studies when in spite of bad food, bad lodging, straw beds, and eternal horrible floggings, youths came on foot vast distances to crowd the school of a Tempête—the days when such men as Erasmus and Stondonck, after toiling out the daylight, mounted a clock-tower to study still by the gratuitous moonbeams—the days when Ronsard and Baif occupied one bedroom, and rose, one after the other, in turns, long after midnight, to go shares in their single candle and keep the same spot warm; those days have gone by for ever, and we can neither reproduce their acquisitions, nor galvanize them into life. People see now, as Montaigne's father saw more than three hundred years ago, that a scholar may cost much too dear; and they are beginning to see that to produce your scholar here and there, you are apt to sacrifice multitudes of minds no less gifted, it may be far more gifted, than his. The complaint is no new one. "It is deplorable," says the poet Cowley, himself a brilliant scholar, "to consider the loss which children make at most schools, employing, or rather casting away, six or seven years in the learning of words only, and that very imperfectly." "We do amiss," says John Milton—a man whose opinion is of infinite importance, not only for his immense learning and splendid imagination, but also because he stands out of nineteen Christian centuries as one of the grandest ideals of a noble and cul-

^{*} See H. Rigault, Œuvres Complètes, ii. p. 150.

tivated manhood—"We do amiss to spend seven or eight years merely in scraping together so much miserable Greek and Latin, as might be learnt otherwise easily and delightfully in one year." "Would not a Chinese who took notice of our way of breeding," says John Locke, "be apt to imagine that all our young gentlemen were designed to be teachers and professors of the dead languages of foreign countries, and not to be men of business in their own?" After three such testimonies I need hardly add more; but I could easily produce a catena of overwhelming testimony in the same direction of our best and greatest men; from these down to Whewell and Macaulay, and that great, good Prince, who has many a time sat in that chair, and whose wisdom and foresight we only then began to acknowledge, when he was far beyond the reach of our ungrudging censure and our niggardly applause. And that voice would be swelled not only by the all but unanimous testimony of our greatest men of science—the Herschels, the Tyndalls, the Huxleys, the Faradays—but also by a vast crowd of our living statesmen, orators, philosophers, and poets; nay more, from both our Universities, by some of the very best and profoundest scholars of the present day. It should be a significant sign to our educational conservatives that within this very year two such statesmen and thinkers as Mr. Lowe and Mr. Mill—the one eminent as a scholar, the other as a philosopher—should both have spoken of the main staple of our Public School education with scathing and undisguised contempt. Impenetrable as the deaf and sluggish majesty of prescription, and serene as the dull self-complacency of routine may be, it is impossible not to hope that, assaulted by such batteries as these, routine and prescription are beginning to totter to their fall.

I have less, however, to do with any general cause for the failure of our system, than with two special ones of which I wish particularly to speak. I mean, first, the fact that some of our existing methods are so disagreeable and illogical as to clog all progress, even in our narrow path, with difficulties all but insuperable, even when we have absorbed an inordinate length of time; and secondly, that we have hitherto coldly refused, or but partially admitted, an alliance with those fruitful scientific studies, which can put forth a claim to reverence far prouder than our own, and which would have given our own studies material assistance by the very act of making room for more.

First, then, I believe that one of the reasons why classical studies lie across the path of education, unprogressive themselves and a hindrance to all other progress, is the present superstitious devotion to Greek and Latin composition, and the present irrational mode of studying grammar. It is in this direction that our reform must be most radical and most imperative.

That nebulous halo of admiration which for many years has so densely enshrouded Greek and Latin composition, and which has given to their proportions as seen through the mist a sort of indefinite and

colossal grandeur, was perhaps the cause why the Royal Commissioners expressed no word of reprobation against the pursuit, and neither sought nor elicited any evidence condemnatory of their practice. To myself, trained in the system for years, and training others in it for years—being one of those who succeeded in it, if that amount of progress which has been thought worthy of high classical honours in two Universities may be called success-influenced therefore by every conceivable prejudice of authority, experience, and personal vanity in its favour-I can only give my emphatic conclusion that every year the practice of it appears to me increasingly deplorable, and the theory of it every year increasingly absurd. Any facility which I may myself have attained in it I hold exceedingly cheap; I should estimate its value as simply nought in any inventory of my intellectual possessions. The utterly extravagant value attached to Greek and Latin verse, and the utterly untenable arguments urged in its favour, are irritating enough; but with me all minor irritation is lost in deep pain and regret, when year after year I see boys of eighteen and nineteen who have been working for ten years or more at Latin verses under conscientious and able teachers, and who at the end of that time are unable to produce one single line that is not flagrantly incorrect and intolerably odious to every reasonable mind. Almost daily it is my fortune to see poor boys ploughing barren poetic fields in the shape of verse-books with a grammar and dictionary "unequally yoked together like ox and ass." This is the kind of thing they have to turn into Latin elegaics—for instance (to give only a favourable specimen), this lucid address to the sun:-

> "Thou, midmost of our world, I narrate wonders, Rulest stars, lest they should wander, laws being broken."

Or this :-

"The fiery steed, his tail in air proudly cocked, Not without much neighing, traverses glad pastures."

This is the sort of "kelp and brickdust" used to polish the cogs of their mental machinery! And when for a good decade of human life, and those its most invaluable years, a boy has stumbled on this dreadful mill-round without progressing a single step, and is plucked at his matriculation for Latin prose, we flatter ourselves, forsooth, that we have been giving him the best means for learning Latin quantities, for improving taste (or what passes for such!) andcredite posteri!-for acquiring the niceties of Greek and Latin scholarship! We resent the nickname of the Chinese of Europe, yet our education offers the closest possible analogue to that which reigns in the Celestial empire, and for centuries we have continued, and are continuing, a system to which (so far as I know) no other civilised nation attaches any importance, yet which leaves us to borrow our scholarship second-hand from them; which is now necessary for the very highest classical honours at the University of Cambridge alone; in which only one has a partial glimmering of success for hundreds and hundreds who inevitably fail; and in which the few exceptional successes are so flagrantly useless, that they can only be regarded at the best as a somewhat trivial and fantastic accomplishment,—an accomplishment so singularly barren of all results, that it has scarcely produced a dozen original poems on which the world sets the most trifling value, or which (as I believe) even a Bavius or a Mævius could have owned without a blush. While we waste years in thus perniciously fostering idle verbal imitations, and in neglecting the rich fruit of ancient learning for its bitter, useless, and unwholesome husk-while we thus dwarf many a vigorous intellect, and disgust many a manly mind—while a great University, neglecting in great measure the literature and the philosophy of two great nations, contents itself with being, in the words of one of its greatest sons, "a Bestower of Rewards for Schoolboy Merit"—while thousands of despairing boys thus waste their precious hours in "contracting their own views and deadening their own sensibilities" by a failure in the acquisition of the useless-while we apply this inconceivably irrational process to Greek and Latin, and to no other language ever yet taught under the sun-while we thus accumulate instruction without education, and feel no shame or compunction if at the end of many years we thrust our youth in all their unarmed ignorance through the open gate of life-while, I say, such a system as this continues and flourishes, which most practical men have long scorned with an immeasurable contempt, do not let us consider that we have advanced a single step in reforming education, to reform which (in the words of Leibnitz) is to reform society and to reform mankind.

Do not imagine that any of these convictions are new. If time permitted I could corroborate them by multitudes of facts, maintain them with most cogent arguments, and support them by the most splendid authority,—if indeed authority be needed to prove that an unique absurdity, condemned by its unique failure, is irrational and wrong. Phillips compared it to going from point to point in curved lines. It is a "preposterous exaction," said Milton, the greatest of all our Latin versifiers, no less than one of our greatest men; "these are not matters to be wrung from poor striplings, like blood from the nose, or the plucking of untimely fruit." "See that your son be not employed in making themes, neither verses of any kind," says the strong common-sense and manly wisdom of John Locke; "it is a sort of Egyptian tyranny," and "if he have no poetic taste 'tis the most unreasonable thing in the world to torment him and waste his time about that which can never succeed." "Versification in a dead language," says another eminent scholar-Lord Macaulay-"is an exotic, a far-fetched, costly, sickly exotic. The soils on which the rarity flourishes are in general as ill suited to the production of native poetry as the flower-pots of a hothouse to the growth of oaks." "It appears to me a cruel absurdity," says Bishop Thirlwall, "to attempt to forestall an imitative instinct . . . by forcing young boys through the hardest drudgery and at a great expense of time, to wrap the vacancy of thought in Ciceronian phrases, and to hammer nonsense into Horatian metres." "To what purpose," asks Mr. John Stuart Mill, in his recent great address at St. Andrew's, * which I should like to see framed and glazed in every schoolmaster's study, "should the most precious years of early life be irreparably squandered in learning to write bad Latin and Greek verses? I do not see that we are much the better even for those who end by writing good ones. Can our favourites of fortune find no better or more serious employment than these nugæ difficiles? Are we to pay this extravagant price for acquiring the pernicious faculty of stringing together borrowed phrases—a habit which a teacher should consider it one of his first duties to repress?" For myself, as one who has seen the thing in actual working, I will only add, that if one could but show the world what the teaching of Latin verse practically amounts to, and the kind of paltry poésie épithétique in which at the best it practically ends,—if the verses written in any one verse examination by any one school in any one day were but laid before the world, with the ages of the boys appended, and the number of hours which the boys have spent for years in thus not progressing a step in this enervating drudgery, I firmly believe that the system would not last a week longer, because then Englishmen would see—as clearly as I know, that an ever increasing number of scholars and of schoolmasters have long seen—that in sacrificing so much time and so many branches of study to the non-achievement of this puny accomplishment, is to make our sons slave in the service of a huge gilt empty idol-it is to worship a fly or a beetle, and daily to offer a hecatomb of costly oxen in sacrifice thereto.

I pass from our empty infructuous years of Greek and Latin verse-making to another blot upon our system no less pernicious,—I mean the illogical and indefensible way in which we teach grammar. Here too, I believe, we have another instance of—

"Blind authority beating with his staff in the child that might have led him."

Nothing can be more certain than that the comprehension of grammar comes after the mastery of language; that the science of grammar (for there is such a science, and a noble one it is) is at once abstruse and difficult, and that its deeply-seated metaphysical principles are best attained by an analysis of abundant linguistic facts already appreciated. Yet what do we do? we try to build up a boy's knowledge synthetically by plunging him at once into a bewildering mass of intricate rules and anomalous exceptions; and instead of making him understand these, we effectually prevent him from ever learning them in any real sense by making him learn them by rote: † and then, as though it had been our express object to paralyse his own intellectual powers, we shroud these mysterious instructions in the

^{*} I may perhaps be allowed to observe that the whole of my discourse (except this clause) was written before the delivery of Mr. Mill's address.

† "Scavoir par cœur n'est pas scavoir."—Montaigne.

very language which he is supposed not to understand! Well may Mr. Herbert Spencer speak of "that intensely stupid practice, the teaching of grammar to children." "Grammar," says Horne Tooke (who surely was a good judge, if any one was), "is among the first things taught, and the latest understood." Yet what happens? what is happening at this moment to your little sons? They are being "dragged through grammar as through a cactus-bush,"-being taught it in a way which always reminds me of Judges viii. 16, where it says that Gideon "took thorns of the wilderness, and briers, and with these he taught the men of Succoth." They have been sent to a preparatory school, where the two main implements of education put into their innocent and unsuspecting hands are a primer and a versebook. The verse-book is the kind of thing of which I have given you a specimen; the primer—that utterly disastrous legacy of the commission which, in spite of the strenuous opposition of many of us, is now forced as a standard grammar upon nine great public, and countless private schools—is a delightful manual in which the little victim, not without amazement, learns by heart in Latin a multitude of such lucid empiricisms as that "factitive verbs have two accusatives, one of the object, the other of the oblique complement!"

Here too, at the tender age of eight or nine his young imagination is terrified, often by ignorant men, with such incubi and succubi as "quid-quale verbs," "gerundive attractions," "suboblique clauses," "spirants," "receptive complements," "relations circumstantive and prolative," "quasi-passives," "semi-deponents," and I know not what, -which are hard enough for grown men to understand, even if they do not despise this clatter of pedantic (because needless) polysyllables, but which to a child must be worse than "Gorgons, and Hydras, and Chimeras dire." Imagine, ladies and gentlemen, that at this moment you yourselves were desirous to learn Arabic; imagine an Arabic grammar, with rules in Arabic, put into your hands; imagine these Arabic rules clothed in a scholastic terminology, and bristling with philosophical abstractions, interspersed here and there with the castanet music of an abhorrent doggrel; imagine that the Arabic verb, like the Greek verb, had twelve hundred synthetic forms, and that you had to learn them every one by heart before proceeding a step; imagine that this amazing sum-total were forced on you in a solid and amorphous form, perhaps by a wholly incompetent teacher who repressed all questions at the point of the ferula; imagine this, and you have the very photograph of what in very many cases is being done with your little sons in Greek and Latin. Can "the theory of elementary unintelligibility" go farther than this? Would it be possible to be more ingenuously out of harmony with all that is natural? After such a grievous waste of time, are you astonished at failure? Are you surprised if your son, thus suddenly introduced from the mid-sunlight of his boyhood into these "yawning caves where glaring monsters lie," and where, like the Indian hunter, he is forced into chronic indigestion

by feeding on dry Greek roots,—are you astonished if he revolts and succumbs altogether? Or, should he be courageous and lucky enough to emerge undazed, retires for life into what Sidney Smith calls "the safe and elegant imbecility of classical learning," with a confirmed habit for "credulously swallowing millstones with passive obedience,"—crammed with dead words, but unapt for living inquiry,—with plenty of second-hand knowledge reflected and refracted through the semi-opaque medium of books, but with a sight too bedimmed in this long darkness to gaze on the sun-bright and unveiled countenance of truth. "There is no study," says Professor Halford Vaughan, "that could prove more successful in producing often thorough idleness and vacancy of mind, parrot-like repetition and sing-song knowledge, to the abeyance and destruction of the intellectual powers, as well as to the loss and paralysis of the outward senses, than our traditional study and

idolatry of language."

But, if this be so with the successful, what are the results with the unsuccessful? Ask our modern writers of genius, and they will point to the ambition, the dissipation, the restlessness of our wealthier classes. Ask our parents, and they will sigh over the vacant hours spent in lounging in the billiard-room and the stable-yard. Ask our schoolmasters, and they will deplore the number of dunces and idlers whom they produce. Ask our most zealous and earnest college tutors, and they will tell of undergraduates who regard their royal and sacred seats of learning as luxurious and fashionable clubs,—of torpid minds that either do not care to read enough for the most elementary examinations, or only cram through them with infinite difficulty and disgust. Contrast this languishing inefficiency of unprogressive studies with the keen, passionate, eager, undaunted enthusiasm wherewith thousands of minds, hitherto untrained, are flinging their whole energy into the toils of science, and thereby adding year by year to the fair sum of human knowledge; and then ask if the nature of our studies be not to blame? "I do not wonder," says Tanaquil Faber, who, at least, succeeded in making his own daughter, Madame Dacier, one of the first scholars of her day, "that one-half of our boys who go to schools, do become downright asses rather than learned men." While, if you turn once more to Milton's opinion, you will find that he sets down barren hearts—a tendency "to live in ease and luxury," and "an ambitious, mercenary, or ignorantly zealous divinity"-to the fact of boys "misspending their prime youth at the schools and universities in learning mere words," and being "deluded with ragged notions and babblements, while they expected worthy and delightful knowledge."

With facts like these before us, how long, I ask, are we to leave our education "sickening in this muddy pool of conformity and tradition?" Are we to go on for ever conjugating and declining, and gerund-grinding, and Latin-verse manufacturing, "while the great world spins for ever down the ringing grooves of change?" I speak, be it observed, in the highest interest of Classics. I would not aban-

don them as the basis of a liberal education; I feel their abuse somewhat bitterly, only because I know how great may be their proper use. I am not one of that large and increasing multitude who say that classical education is a barren tree, and that the axe must be laid mercilessly at its very root. I say, on the contrary, that it is a fair tree and a strong, and that if we cut off its dead and unsightly branches, we may still leave its stem in the tender grass of the field, and that men's hopes and fears may still—

"Take shelter in The fragrance of its complicated glooms, And cool impleached twilights."

I know that the Classics introduce us into a region of virtues in which our modern life is meanest and most meagre. I should hold it disastrous to disintegrate ourselves altogether from the past, and to break the chain of its noble associations. But this is the precise effect which is now being produced by the wretched baldness and poverty of our system. The worst enemies of classical education are those who would stereotype its present imbecility. I am no enemy, but a sincere and humble supporter of classical education properly supplemented and properly understood. That against which I have been pleading is not knowledge of the classics, but ignorance of their entire spirit; not classics, but the degradation of the classics; not the thoughts of the ancients enshrined in their noblest literature, but a paltry stringing together of the artificial phrases of their rhetoric; not a sound learning, but a shallow simulacrum of superiority; not mental training, but a mere knack acquired by desultory reading and incessant practice; a peacock's feather, which, though it has often been a proof of intellectual rank, yet often waves over very empty skulls-a trick so difficult and so useless that it averts robust minds from all classical study, and is capable (on the published confession of some of its best representatives)* of coexisting with a profound ignorance on all subjects, ancient as well as modern. These are not the results of classical teaching in any high and noble sense; but of its fantastic abuse by methods which our best and wisest men have combined in denouncing as glaringly irrational and curiously bad.

But further, and lastly, I would ask, if this idol of the theatre is still to be worshipped, how long shall its service be so exclusive as now it is? However high we are to place classics, are we still to act as though they were the sole end and aim of education, and as though men had neither the faculties nor the thirst for any other kind of knowledge? Are we never to get rid of this bed of Procrustes, which for some is inordinately long, for some intolerably short? I allude of course to that second special cause for the failure of our system, in the

^{*} See Public Schools Commission Report, ii. 43, 44, 50; Cambridge Commission Report, p. 293.

short-sighted neglect which has suffered our boys to grow up in total ignorance of, sometimes in disgraceful contempt for, every scientific pursuit. In an age which is emphatically the age of science,

"Mid the mighty march of mind, The steamship, and the railway, and the thoughts that shake mankind,"

a boy has been suffered to know nothing of the world of wonder, of beauty, and of power, in which his lot is cast. What has science achieved within this century? She has made the shattering force of the electric spark obediently speed her messages through the heart of iron mountains, and under the waves of raging seas; she has kindled her silver beacons on the wave-tormented crags, as though to light up an avenue to her palace front; she has enabled the sailor to steer in safety amid the breaker's wintry surge, and the miner to work in safety amid the blasting fire-damp of the mine; she has drawn the forked lightning in harmless splendour out of the purple cloud; she has discovered the precious anodyne which lulls the senses into calm and dreamless sleep, while the work of agony, agonising no longer, is wrought upon the human frame; with a scratch of her lancet she has stayed the loathsome ravages of disease; she has forced upon reluctant selfishness, and branded into the brain of invincible ignorance, those beneficent laws which paralyse the fury of the pestilence, and restore health and buoyancy to the factory and the hut; all this and more, she is doing, and has done; and the history of her discoveries, and the knowledge of the methods she has used in all this majestic sorcery, would, I take it, be almost as useful, and would effect as much for the human race, as the most delicate appreciation of the particle ye, or even as an approximate knowledge of the uses of av with the moods! Oh, if the world is to be transformed for our boys into the cave I have described, at least suffer them to look round upon it, and enter it torch in hand:—

"And bid with lifted torch its starry walls
Sparkle, as erst they sparkled to the glow
Of odorous lamp tended by saint and sage!"

It would give reality, it would give utility, it would give happiness to their education. It would give reality. Our present system does not represent the existing state of knowledge. It deals with names, not things; with grammar, not facts; with books, not phenomena. It learns, but does not acquire; it imitates, but does not observe. With a Paradise open before us, it fumbles at the old and costly key of a second-hand knowledge. It acts as though God had turned His creatures into a world in which there was no such thing as education until Greece and Rome emerged. What wonder that our boys have ceased to feel all relation between these dead and barren vocables and their bright and living world? We have not enlisted among them the services of what Dr. Brown calls "that resident teacher within the

skin," who is for ever giving his lessons while we are giving ours. Our boys are getting weary of Horace and Ovid:—

"Earth outgrows the mythic fancies
Sung beside her in her youth;
And those debonnaire romances
Sound but dull beside the truth;
Phœbus' chariot-course is run!
Look up, poets, to the sun;
Pan, Pan, is dead!"

Then it would give our education more usefulness. I use the word in no vulgar or sordid sense. I do not only mean professionally though surely that is not wholly unimportant; nor do I mean by the stimulus to great philanthropic discoveries, though that too ought not to be despised; but I mean morally, and socially, and intellectually as well. To speak of the benefit of scientific knowledge to our physicians, our barristers, our engineers, our soldiers, our country gentlemen, would be waste of time, and owing to a deeply-seated stupidity I have never been able to see anything specially glorious in inutility per se. But it is worth while to take the single instance of the use of science to our clergy. Seeing that the Bible, in page after page, to say nothing of whole books of it, is constantly occupied in directing profound attention to the power of God as proved by the magnificence of His Creation,—seeing that the Saviour of the world points, as the special proofs of God's love, to His care for the mountain lily, and the falling sparrow, and the raven's callow brood,—is not our education, and especially that of our clergy, distinctly irreligious in neglecting these things, and in elevating the poor words of man, as an instrument of training, unmeasurably above the mighty works of God? And with what results? It would be hardly possible to exaggerate their disastrous importance. Not only do the clergy, who should be the leaders of thought, lose the advantage of assisting in a thousand ways their poorer parishioners, but they find themselves actually inferior in these great fields of knowledge to many clerks and artisans in their own congregations, before whom they cannot venture to speak of them without the danger of raising a contemptuous smile. This, however, is the least part of the evil. Science has interpenetrated to a wonderful degree the thoughts, the speculations, nay, even the common literature of the age, and yet the clergy are wholly out of sympathy with it; in many instances are suspicious of it; in many more are its bitter and ignorant opponents. Scarcely has there been an eminent philosopher, from Roger Bacon down to Comte, -scarcely an eminent discoverer, from Galileo down to Darwin, who has not counted the clergy among his most ruthless opponents. I challenge denial of the fact. Against astronomy, against zoology, against chemistry, against geology, against ethnology, against philology,—against well-nigh every nascent science in its turn-has theological arrogance and selfstyled orthodoxy marshalled their menacing array of misinterpreted or inapplicable fragments of Holy Writ. Just as of old "fops refuted

Berkeley with a sneer," so now some young ordained B.A. finds it easy to crush Darwin with a text. Is it, I ask, uncommon to hear some ignorant clergyman who has laboriously scraped into a poll degree, lay down the law as though he held the keys of all knowledge in his hand, and could afford to pity and look down upon those splendid students, whose lives have been one long-continued heroism of candour and research? You may say that an opposition of this calibre usually ends in some complacent avowal of the ardent friendship between science and theology, and in the acceptance as axiomatic truisms of what had previously been denounced as atheistical and absurd. But meanwhile, what happens? Men of science, confounding religion with the anachronisms of its most feeble and most violent expounders, too often hold aloof from a Church whose inmost heart is intensely truthful,—a Church which well knows the delight that deeply religious minds have ever felt in reverent inquiry into the laws of God, and which sees more of her own real spirit in the patient labours of science than in unprogressive idleness and theological hate.

The remedy is simple. Let the boys who are to become our clergy be trained, if it be but in one single science; let them see the stern and simple accuracy of its methods; let them observe the singleness of its eye for truth, and truth alone; -let them mark its inevitable progress over triumphant errors;-let them be initiated in the labour, the sincerity, the patience, the self-devotion, the precision of thought which it requires,—and then we shall hear no more of the preposterous falsehood that science is inimical to true religion, and see no more of men who prefer anathema to inquiry, -who rather than sit at God's feet, and learn the great laws which He reveals to the humble and to the patient, prefer to gyrate round and round in the petty circle of one-thousandth-hand expositions, or, if I may borrow an old simile, to make long voyages in the belly of Jonah's whale,traversing immense distances but seeing nothing in the world. It is my solemn belief, and a belief that I am neither afraid nor ashamed to avow, that the scepticism so often laid to the charge of science, is in reality the necessary result of its neglect.

In conclusion, I confidently look to an education in science for a considerable increase of youthful happiness. How do many boys regard their school-hours? Chiefly as time spent in the close atmosphere of a dull room over verbal disquisitions for which they care little, and verbal imitations for which they care still less. If you would have them progress in such studies, and believe in them, you must superadd another education, which by enlisting their sympathies, shall awake their dormant faculties and save their decaying self-respect. You must teach the boy who fails in classics that the authority of long words in crabbed books is not the only source of knowledge; that he can use his untrained senses as the gateways for a thousand forms of instruction; that the theory which strove to make teaching unpleasant was an odious and unnatural heresy; and that his

education, so far from ceasing, is but being continued (if he so wills it) with greater intensity when with open eyes, and senses keenly observant, he is living under the blue temple-roof of heaven,—storing his cabinet with the gorgeous and delicate loveliness of shells and butterflies and eggs,-or following the game on the mountain-side, ancle-deep in purple heather, knee-deep in the tall green ferns. Teach him that in every dewdrop brushed away by his careless feet there slumbers the electric flame; teach him that there is no flower which he can pluck, in the study of which he may not soon reach those "flammantia mænia mundi" over which not even the eagle wing of science can soar; teach him that there is not the simplest phenomenon of his daily life which does not involve for its explanation the agency of the most marvellous and eternal laws. Show him too that, when once taught to read and write, and think, and use his senses, he has been equipped in all the panoply wherewith the giants of human intellect have made the elements of the physical world their slaves; that with no more potent instrument than his own kite he may take the lightning by the wing; that in the falling of an apple, and the swinging of a lamp, and the thoughts of an idle boy as he watched the steam condensing on the bowl of his silver spoon and the twitching of a dead frog's leg when it was touched by a scalpel as it lay upon a plate, lay hid the secrets of the rolling of the planets, and the mode in which we mark the flight of time, and the rushing of the railway engine, and the means whereby with the simplest possible materials we can put a girdle in a few seconds round the globe. Add this to your classical system, and the frequency of dunces will cease to be a commonplace of schoolmasters. I dare not indeed use the strong language of Milton, when he says, "I doubt not that ye shall have more ado to drive our dullest and laziest youth, our stocks and stubs, from the infinite desire of such a happy nurture, than we have now to hale and drag our hopefullest and choicest wits to that asinine feast of sowthistles and brambles which is commonly set before them as the food and entertainment of their tenderest and most docile age;"—but I do say with him that the path of a virtuous and noble education is "so smooth, so green, so full of goodly prospects and melodious sounds on every side, that the harp of Orpheus was not more charming,"-I do say that the kind of education which here I advocate will be fruitful of the mightiest advantages both to England as a nation and to thousands of her individual sons, -and that it is

[&]quot;Not harsh and rugged, as dull fools suppose, But musical as is Apollo's lute, And a perpetual feast of nectared sweets, Where no crude surfeit reigns,"