

be strained to forward their exertions, and terminate them speedily with success; and that for this purpose our wealth should place at their disposal all that science, and patriotism, and benevolence can suggest. Again, on the return of peace, when the danger has been overcome and the national burdens lightened, we should let no re-action carry us too far. Instead of aiming at perilous retrenchments in our military expenditure, which some are "busied about" as if it were "the one thing needful," we should turn our attention to improvements in the internal organization of our military system: to see how its condition and efficiency could be improved by a better distribution and adjustment of its different functions; by the encouragement and timely adoption of the results of scientific research; and, in fine, by the cultivation of worth, ability, and intelligence, and by a proper recognition of them beyond every other consideration. It is thus, by turning the contributions of the public to the best account, that unnecessary demands on the capital of the country will be most safely obviated and the likelihood of war decreased. By our presenting an impenetrable front, other communities, if actuated by no better motives, will recognise the hopelessness of any attack on ourselves; while the weight with which the indignation of the people can back their remonstrance in behalf of the rights of others, will so far tend to forward the peaceful negotiation of differences, and so realise the wish of every well-disposed and prudent man.

War is in every respect the enemy of the interests of mankind. It wastes the wealth that peace has accumulated; it disturbs trade, and embitters international feelings; and, which is far more serious, it shows a disregard, in some quarter, of the spirit of Christianity.

We should take heed, then, that we engage in no war that is not both necessary and just. But we should remember, on the other hand, that if we allow our wealth and our commercial prosperity to invite or tempt attack by a show of indifference, inefficiency, or neglect, we also are responsible for the consequences; we are morally partakers in the folly and guilt of the after-conflict, as surely as there is truth in morality.

The need for national defence will lessen only with the spread of enlightened and philanthropic views throughout the world. Such "were a consummation devoutly to be wished." But till it have arrived, we are bound, by necessity and by duty, to use the best means we can command for our protection from assault; and that Standing Armies are such a means I have now endeavoured to prove.

V.—*Factory Education.*—By P. J. M'Kenna, Esq.

[Read 19th March, 1855.]

The tendency of the present age is evidently to consult for the amelioration of the condition of the humbler classes. Men are now awakening to a sense of their duties, and begin to bear in mind

that wealth and power are given but to a few and should be used for the advantage of their fellow men. Policy, however, as well as duty, would teach us to care for those who, with physical powers that may be converted to dangerous uses, are steeped in ignorance and want. It would be needless to point out the advantages of, or the necessity for, educating the great masses; and knowing, as I do, that there are amongst our members many men who, from their position as directors of railway and other companies and as proprietors of large manufacturing establishments, possess considerable power and influence, I consider it especially desirable to bring under the consideration of this Society some details connected with a system of factory education which has been attempted by the proprietors of Price's Patent Candle Company, and has been productive of the most desirable results. As I have already said, I think the proper feeling of consideration for our humble fellow-men is very generally diffused amongst those possessing the greatest power for good; and I have no doubt that there are not a few heads of large establishments who only require to have a plan for the moral and social improvement of their work-people suggested to them and proved to be successful, in order to adopt it. I trust that this paper, by attracting the attention of such men to a course of education as connected with factories and factory concerns, will effect much direct and immediate good; and I have little fear that those into whose hands my paper shall come will deserve the following reproach of Mr. Wilson, the manager of Price's Patent Candle Company, or neglect his hint.

"The best that a clever and energetic man can expect from going into 'society,' or from getting into parliament, is a certain amount of usefulness and happiness; but he has already under his feet, in his own factory, a mine of untried usefulness and happiness to himself and to others, difficult enough, no doubt, to open, and requiring, perhaps, a good deal of apparently profitless digging at first, but containing veins of such richness as when once struck to repay ten times over any exertion it may have cost him to reach them. In 'society' and in parliament a man has to deal with minds as much formed and as little pliable as his own, so that without extraordinary powers it is not much that he can hope to do in the way of influencing them. But in his factory he needs no such powers. His mere position disposes every mind in it to form itself upon his, and the extent of his influence is bounded only by the limits he himself may choose to put to the trouble he will take to acquire it. I think manufacturers getting into parliament, and then asking for education bills, are acting as if fathers of families were to devote themselves to parish business, and use the power thus acquired to procure the creation of a lot of additional beadsles to go and manage their families for them in their absence."

Price's Patent Candle Company, as it is called, is a very extensive copartnership, with a large body of proprietors. Some idea of its extent may be formed from the fact that there are at times as many as 800 children connected with the Company's works attending the schools. I mention this lest some of the figures mentioned as to the expense of their educational establishments should terrify

others, as it should be borne in mind that such expenses are always relative, and that from a company clearing £20,000 per annum £500 is only equivalent to a sum of £50 from the proprietors of a small concern whose business is worth but £2,000 annually. This Company has been wonderfully fortunate in its selection of a manager, as, to judge from his conduct and letters, a man of purer philanthropy could not be found, while at the same time he conducts the business of the establishment with the greatest possible regard to the interests of the proprietors. To him may be justly ascribed the merit of reconciling the interests of the working man and his employer, and of showing that a little consideration and care, and a trifling expenditure for the benefit of the working man, are amply repaid by the increased attention, activity, and good-will of the employed. It is in a report, or rather a series of reports, commencing in 1852, furnished by him to the proprietors, of the success of his efforts in providing for the education of the factory people, that the details from which I extract may be found. The origin of the schools connected with this extensive establishment is thus related by Mr. Wilson, and it is gratifying to find that they originated with the boys themselves.

“The schools began in a very humble way, by half a dozen of our boys hiding themselves behind a bench two or three times a week, after they had done their day’s work and had had their tea, to practise writing on scraps of paper with worn-out pens begged from the counting-house. The foreman of this department encouraged them, and as they persevered and were joined by others of the boys, he begged that some rough moveable desks might be made for them. When they had obtained these, they used to clear away the candle boxes at night and set up the desks, and thus work more comfortably than before, although still at great disadvantages as compared with working in any ordinary school. My brother encouraged them with some books as prizes, and many who had been very backward, improved much in reading and writing.”

The first half dozen soon increased to about thirty, and it was found that the boys, in addition to the loss of time spent in clearing their school-room, had the further difficulty of insufficient space for their numbers, to contend with. Under these circumstances, Mr. Wilson availed himself of the opportunity of converting a useless old store into a large and convenient schoolroom, capable of containing upwards of one hundred boys. In the winter of 1848, possession was taken of the schoolroom by the boys, who were as yet self-educating and self-governed. This system of self-government was found after a time, as may be imagined, unsatisfactory; as the more advanced boys could not get on without a preceptor, and the school was falling somewhat into disorder for want of a head. Accordingly, at the request of the boys themselves, the management was to a certain extent taken out of their hands.

It may be observed here, that there was originated also a day-school, for the benefit of all the boys connected with the factory; and that those who were not in immediate employment, either from there being, as occasionally was the case, a slackness of work, or from their not being yet entered on the factory books, might avail

themselves of the advantages presented by the managers' care. During some weeks, from the press of work, there would be found but one hundred boys attending in the day-school, while in others there would be as many as one hundred and forty. Mr. Wilson's estimate of the annual expense of the day-school is £130, of which the sum of £96 is for regular salaries. One of the chief advantages presented by such a school (independent of the satisfaction that must be felt in discharging our duty to those who are to a certain extent entrusted to our care) seems to be the securing a superior class of work people, of tried intelligence and good conduct; as employment in the factory or the works with which the school is connected might be held out as the reward of special attention and propriety of manners. Again, it is a matter of no slight consequence to have the young hands of a factory kept, during their unemployed hours, out of idleness and its likely consequence, some kind of useless if not vicious occupation. Progress of some kind there must be, either for good or evil, and if some care be not taken to improve, such is the tendency of mankind, especially when associated, that demoralization will ensue. In the course of the meeting of proprietors at which Mr. Wilson's suggestions and his outlay were approved of, one of the proprietors makes some observations on this subject, the truth and force of which all must admit.

"Which of us does not know too well the great evils and intense temptations to which the uncared-for children of our English factories are necessarily exposed when herded together in hot contaminating crowds, and regarded, as the very term 'hands' so generally applied to them itself suggests, rather as so many mere components of the machinery than as human beings? Shall we not in our factories obviate this evil by increasing, so far as we can by education, the average moral strength of those by whose toils we profit? And shall we not at the same time strive earnestly to purify the moral atmosphere in which they work, by shutting out or at least mitigating the temptations and occasions of evil which the average moral strength of factory children is found incapable of resisting? It is said—you must all have frequently heard it—that joint stock companies have no consciences. Let this company prove itself an exception to any such rule by acting towards its factory 'hands' as not forgetting that those factory 'hands' have immortal souls."

As regarded the evening schools for those who were employed in the manufactories during the day, although they were well attended, it was found that the numbers were not so great as they should have been. In truth, when one considers the situation of those boys or young men, engaged in arduous labour during the day, not alone uneducated, but almost ignorant of the advantages of education, the wonder is that the schools were so well attended. With equal ingenuity and good taste Mr. Wilson adopted a plan which, as he himself says, without casting a slur upon those who did not attend, would yet encourage the well-disposed and attentive.

"With this view we repeatedly in the spring and summer of 1849 asked all the school to a tea party in the new room. The first tea was an interesting one from the fact that very many of the boys had

not been at anything of the sort before, and that many of them, not being in the habit of going to church, had never, perhaps, put themselves into decent clothes at all. Those who came untidily or dirtily dressed to our first tea, feeling themselves out of keeping with the whole thing, tried hard to avoid this at the next party. I hope that to several our first tea was the occasion of their taking to neat dressing for life."

Afterwards greater inducements were held out to the school-boys in the shape of prize books, cricket matches, and occasional pleasure excursions.

Mr. Wilson very properly considers that when boys who have been working all day give up an hour and a-half or two hours in the evening for four nights out of the week to what must be, for some time at least, an irksome employment, that of being instructed, their self-denial should receive some reward and encouragement. He accordingly had a cricket ground prepared for the boys who were attending the school, in which they enjoyed themselves in the proper season; and in the course of each summer treated them to two or three trips to the country, in the neighbourhood of London. Although these matters have no direct reference to education, yet they cannot be considered unimportant as regards the relationship between employers and employed, and the promotion of kindly feeling between the masters and the men. There is also another and still more important branch of education, namely, religious, to which Mr. Wilson has, in his anxiety to make the management of his employers' factories a model for others, given his attention; but to this branch of the subject I shall not further advert. I do not consider it expedient to introduce this much-vexed question, and shall not therefore enter here upon this subject.

The numbers attending these schools and the estimated annual outlay may be of some utility, and are as follows :—

Belmont, evening school.....	211
Belmont, day school.....	103
Night light, boys' school.....	97
Night light, girls' school.....	101
TOTAL.....	512

and the estimated future outlay, based on an average of the current expenses of the preceding years, are :—

	Per annum.
Candle factory, evening school.....	£190 0 0
do. day school.....	130 0 0
Night light, boys' school.....	40 0 0
Night light, girls' school.....	80 0 0
Crickets and gardens.....	80 0 0
Summer excursions.....	55 0 0

Not more on an average than about seventeen shillings a-head for their secular education and such amusements as will alike encourage them in the discharge of their duty and the pursuit of useful and necessary information, and create and promote kindly feeling between the capitalist and the laborer. It is gratifying to find that considerable as are these annual sums, and also the outlay, which was indeed very considerable, in permanent arrangements,

the entire body of the proprietors of this company, with the exception of one dissentient, adopted the suggestions of Mr. Wilson, and voted the necessary sums for carrying on these reformatory educational measures.

Nothing can be more difficult than to show in figures the amount of gain to employers from good conduct, good will, and attention on the part of their work people. Short-sighted and wrong-headed people, who think their primary object is to screw out of their work people at the smallest possible outlay the greatest amount of work, and who really deserve to be classed amongst those who, to use a homely expression, lose their sheep for a pennyworth of tar, always start this objection. Supposing I lay out £300 a year on my people, educating their children and affording them occasional holidays, what return do I get? None! for I cannot reduce it to figures; I cannot make it out in pounds, shillings, and pence. Such a man is blind to his own advantage as well as forgetful of his duty to those who, placed beneath him, are to a certain extent entrusted to his care by their Maker. If he will not trust the evidence of his own senses and his powers of reasoning on those facts, if he will ignore increased activity and attention to work, and their consequence in an increased produce of an improved article, let him try for a year or two the kindly system, that which duty points out to him, and if other disturbing influences should not intervene, he will find an increase in the tot of his yearly profit notwithstanding the outlay. On this subject Mr. Wilson well observes:—

“If I were forced to come to some particular proved instances of benefit to the business, I should take first the one which you witnessed the other night. After coming down from the schools into the factory a number of boys working steadily and well at what a few years back we should not have thought of trusting to any but men, it being an operation requiring much greater care and attention than can be reckoned upon from ordinary untrained factory boys. Yet even here the exact pecuniary amount cannot be stated, for the boys whom you saw at work are not substitutes for men but for machinery. It is the fact of our having at command cheap boy labour which we dare trust that enables us to make now by hand the better sorts of candles, which we used to make like the other sorts in the machines, and which, on account of the hardness of material when so made, were never free from imperfection. The benefit will come to us not in saving of wages (for had the choice been only between the men's dear labour and the machines, we should have stuck to the machines), but in increased trade, through the imperfections of the candles being removed.”

It is to me a matter of considerable regret that the rules of this Society will not permit me to bring under your consideration this topic at the length I could wish, or which the subject deserves. Every effort, however, towards a desirable or useful end, no matter how feeble, may be productive of results; and these few meagre observations may, by attracting the attention of good and wise men, bring into the field competitors worthy to strive with Mr. Wilson for the respect and esteem which he has won from all to whom a knowledge of his exertions in the cause of humanity has been communicated.