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BUILDERS' WORKSHOPS AND WORKMEN AND  
THEIR MANAGEMENT.

BY A BUILDER.

In this paper I propose to treat on various subjects, which may occasionally be unpalatable to those whom the cap fits; but, nevertheless, I hope of interest and use alike to builders, foremen, and workmen. As I have occupied the three positions, I have had opportunities of noting some of the most necessary points in the successful carrying out of work without the necessity of making the master a tyrant, the foreman a bully, and the workmen slaves. I will first give my views on Joiners' Workshops. In the majority of instances workshops are built simply with a view to first cost, or, if built for other purposes, and afterwards adapted to the use of joiners, cheapness of first cost is the rule without regard to comfort or arrangements, without heating apparatus, without ventilation, except where the hurried building allows ventilation in summer or winter alike. If machinery is employed it is badly arranged. The shops are filled as closely as possible with benches of all sorts and sizes, fitted with the cheapest of wood screws. Then it is stocked with an insufficient supply of cramps, glue pots, and other necessary accessories. The workmen are half-roasted in summer, and half-frozen in winter, and yet a foreman is expected to get together a body of good workmen, and to turn out the work as cheaply and as well as if he had every convenience to aid him. A workshop should be carefully, thoughtfully, and systematically arranged by a practical man, with the one aim in view, of lessening labour to a minimum, and of providing every convenience and aid to that end. In this time of keen competition, work is required to be done as cheaply as possible; and if it is to be done cheaply and well, a workshop must be comfortable. In the first place a workshop should be properly ventilated; no man can do as much in a close, humid atmosphere in summer as he can in a cool, well-ventilated workshop. Then, again, it should be fitted with heating apparatus for cold weather. It is a mistake to think that if a shop is cold, a man will work all the harder to keep himself warm. A man standing shivering with the cold beside his bench, with cold hands and cold feet, cannot do half as much work as a man who can pull off his coat and feel comfortable. Besides that, a good workman values a good workshop, and will do his utmost to keep in it. Then, again, as regards the work, a man not only cannot do as much work, but he cannot do it as well. His glue is cold before he can rub a joint, or cramp

up a shoulder, with the result that he might almost as well have kept the glue away from it altogether. Then there is the huddling of men together, with from 18 inch to 21 inch bench-room, on benches of various heights; no man has sufficient room to put together a door or a sash, without to some extent hindering his benchmate; if it is a large piece of work requiring the space of two or three benches, then those two or three men are running about to find pieces to pack up level, and spend as much time in preparing a place to put the work together, out of wind, as is required to do the work; after all this fuss and unnecessary waste of time, the probability is that they have to run about for cramps, or they cannot get glue, or perhaps there is no lengthening-bar to the cramp, and they have to lengthen out with a piece of wood, which, by the time it is done with, will have cost more than a proper lengthening-bar, besides probably being of no use afterwards. And yet those men are expected to do the work as cheaply and as well as if every appliance were at hand. Again, the benches are old, shaky, with tops hollow and twisted—a man cannot try-up a piece of stuff true without packing it, and if he wants to clean up a panel he has to use a panel-board, and perhaps spends as much time in looking for one as would suffice to do the work. The bench-screw is of wood, of a value of 1s. 3d., and if he has anything to hold firmly in the vice, he has to strain, until occasionally he breaks the handle, and wastes a half-hour to make another. Give me a shop with good benches, all uniform in height, fitted with good iron square-thread screws, good, clean, true bench tops, a good supply of light T-iron cramps, with proper socketed lengthening bars, a glue-pot to about every four men; give each man 2 ft. 6 in. bench-room, and I will guarantee to turn out more work than if the same shop was filled till each man had only 18 in. bench-room, and the order of things as in a large percentage of workshops. This means a saving of 20 per cent., and employers can reckon up for themselves how much they would save in wages, according to their shop-room. If you have comfortable shop-room for fifty men, and you place one hundred in it, you will only get a very small amount of extra work done. If I had 150 benches in a shop I would have them good, and I would have them so that if I had a piece of work big enough to cover the lot the men would simply have to lay it on the benches and put it together, with a certainty of it coming off true.

About Machinery. A builder will sometimes put down a lot of machinery; it may have all the latest improvements, but again cheapness and hurry come in, and it is badly ar-