

a mess of pottage; for despite your capacity, such in general is your reward in comparison with your true worth. As individuals, it may not be possible to force the recognition needed, but as a body we are a mighty power capable of securing any reward within reason upon which we set our minds and hearts. It is not only in the government service that engineers receive inadequate reward, but throughout the entire profession, and particularly those employed at railway work.

There is one active full member of our Society who is a resident engineer on one of the transcontinental railways and his salary is \$1000 a month. He has a wife and family. Whose fault is it that such is true? Yours and mine. How much longer is the engineering profession going to continue to be underpaid? Just as long as we permit it, gentlemen, and no longer. We have it in our hands to bring about a different state of affairs, but action is required, not words. We have talked in the past a great deal about inadequate rewards and we may continue to talk, but nothing will be accomplished until we secure a higher standard of reward, and we shall find the accomplishment so easy that the wonder will be why we had not thought of doing so sooner. We are to-day exactly in the position of the man staying out all night on his own doorstep because he thought he could not get in, only to find out in the morning that he had the key in his pocket.

The government and railway officials and the general public have only a vague conception of what they owe to the engineering profession for their material welfare, and they will continue in ignorance until we have educated them. In the meantime, gentlemen, it is we who are culpable, not they.

The newspapers in this country are the great moulders of public opinion, and it is to them we must look, to some extent at least, for co-operation and assistance. For, once we have convinced the editors that in doing this they are assisting in the public weal, the natural patriotism that characterizes the editorial body would prompt them to act and give their hearty support.

The lawyer and the politician have admittedly failed to solve the industrial relations of man to man and the relations between capital and labor. The very qualifications of mind and training that have enabled the engineer to so successfully grasp and solve any problem set before him will be called upon and required to solve and to deal with what will be, after the war, the greatest problem which we have to face.

We find already many of the executives of large industrial concerns being chosen from our own profession and more and more will the men who have received a thorough training in technical matters be called to the high positions in industrial affairs. This will mean the opening up of a scope for the profession, giving rise to a future that will place the technical man in control of the industrial life of the nation. Coincident with that is arriving a condition whereby the engineer must, besides drawing plans and specifications, give his advice in connection with financing of any industrial or engineering undertaking, so that the time is coming, and very soon, that the engineer instead of receiving the reward that capital is willing to offer will walk hand in hand with the capitalist, on an equal footing, and will share in the rewards that the other has heretofore enjoyed.

In view of such enticing prospects and possibilities for the individual, what limit is there to our development as a profession by acting in unison? Here we are, a powerful legion with all the potential attributes of mind, heart and soul to carry us to undreamed-of heights of eminence, and how far we shall rise as a profession is only limited

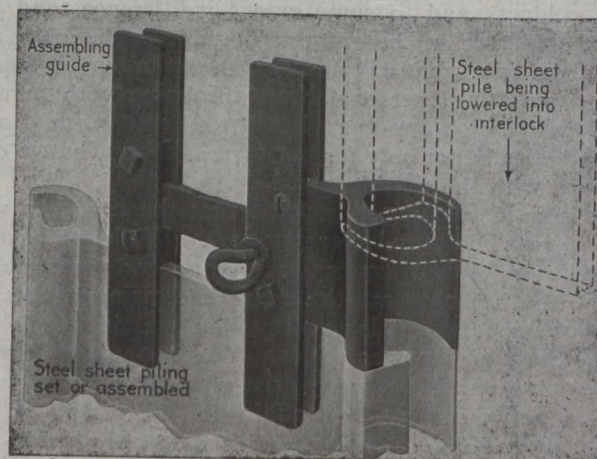
by the minimum amount of effort which each and every one of us is prepared to give in conjunction with his fellows to make what is reasonably possible a living reality.

And speaking from knowledge, gained by experience in my relations with you, gentlemen of the Ottawa branch, you who have been leaders in the affairs of the Society in the past, I know full well that in the forward movement leading to the exaltation of the profession, you are certain to play a very important and a very prominent part.

HELPFUL DEVICE FOR HANDLING STEEL SHEET PILING

The assembling of long lengths of Lackawanna steel sheet piling where the tops of those piling sections which have been assembled or placed remain at a considerable distance from the ground or water level has in the past been subject to one notable annoyance. On windy days, or when the handling line was swung from a barge affected by swells or wave motion, the sway of the piling section being handled has made trouble in steering the interlock of the free piling section into entrance and sliding contact with the interlock of the last piling section placed.

To save time and labor and make the attendant's work safer in this operation, the assembling guide shown was developed by Mr. F. E. Cudworth and very successfully



used in placing the 50 to 70-foot Lackawanna sheet piling sections used in the 46th Street Pier cofferdam, New York City.

This guide sets upon the last piling section placed, is held there by the light, flat jaw pieces on each side, is reversible to handle either position of interlock and is provided with a swivel eye and safety line that prevent the guide from falling out of reach or getting lost in water.

The guide proper is trimmed from a Lackawanna sheet piling section, is about 5 inches long and has part of the thumb of the interlock cut away.

The workman draws the free piling section sidewise into and against the guide as the piling section descends, and as the interlocks are in this way aligned perfectly and slide together on the first trial, the entire equipment and crew can proceed without delay.

It was found in the 46th Street cofferdam that an operator skilled in handling a lighter could easily lower a sheet piling section within the range of the guide and that the guide then enabled the section to be placed with less labor than by any other method attempted.