

THE CANADIAN MANUFACTURER

And Industrial World.

Vol. I.

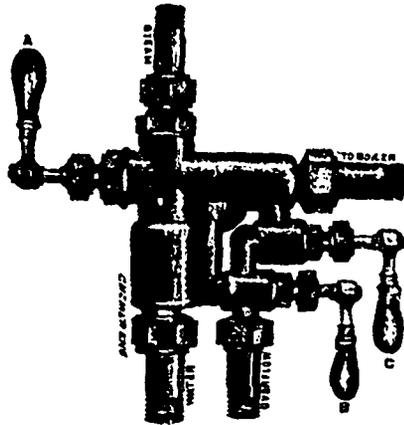
TORONTO, ONT., MARCH 17, 1882.

No. 6.

THE "DUPLEX" INJECTOR.

We present below an illustration of the "Duplex" Injector. Not very long since an Injector of any description was looked upon with distrust by the average engineer in charge of the motive power in most of our mills and factories, but that day is past, the Injector is now a recognized necessity, and it has to a large extent superseded the steam and force pump for the purpose of boiler feeding.

This is not to be wondered at, since its economy in actual use has been so fully demonstrated by practical application, and the use of this appliance is becoming universal. One great recommendation, in our opinion, is the delivery of the water hot to the boiler, thus doing away with the old-time steam heater, with its coils of enclosed pipes that seemed always to get out of order on the slightest pretext and at the busiest moment. (We have had experience ourselves with this description of heater, and the memory evoked is not a happy one.) As the Injector is now an accessory to almost every engine-room, and as several patterns are made, all makers claiming that their particular style is the best, it behoves the



purchasers of such appliances to see that they really secure the best in the market, and in aiding them to this end, we reproduce below, in the makers' own words, some of the special points claimed for the "Duplex."

The Duplex Injector is, as its name implies, a double Injector—one draws water from a well or from a tank, and the other forces it to the boiler, at any steam pressure from 5 to 150 lbs. It requires no adjustment for varying pressures, or for hot or cold water, and is one of the easiest handled Injectors made.

It is one of the best appliances known for feeding boilers, as it always delivers the water hot to the boiler, and all the steam used in operating it is returned to the boiler, there being no loss of heat except by radiation; and, if pipes are covered, practically no loss whatever.

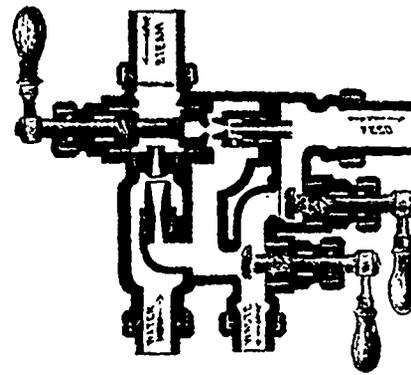
There are no movable parts for adjustment, no valves to

wear, so as to impair the working of the Injector, and it can be safely said that no Injector-made is so little liable to get out of order.

It is superior in design, material and workmanship. It is made with the best improved machinery and tools, so as to duplicate each size perfectly in each particular part, and is furnished as low as a reliable boiler feeder can be made.

When parties use a pump, they, as a rule, have trouble with it, and are satisfied to fix it or spend time in getting it to work; but if an Injector ceases to work for any reason, they will not investigate the cause, but condemn the Injector, when, in ninety-nine cases out of a hundred, the fault is in piping, or some cause outside the Injector.

Messrs. Rice Lewis & Son, Toronto, are the sole agents for this Injector in the Dominion, and they will be pleased to furnish intending purchasers with all particulars that may be re-



quired. Messrs. Rice Lewis & Son also carry a very extensive line of mill and factory hardware supplies, and manufacturers can secure from them any such articles in the shortest time possible. We mention a few of the many other specialties noticed in their handsomely illustrated catalogue, and which are in daily

requirement by manufacturers generally—Machinists' Tools, such as Taps, Dies, Drills, Reamers, Lathe Chucks, Callipers, &c.; Vices, Screw Wrenches, Drilling Machines, Portable Forges, Belt Hooks and Rivets, Safety Globe, Check, and every description of Valves; Steam Whistles, Lubricators, Steam Pumps, Judson Governors, Sturtevant's Blowers, Band Saws, and in fact everything in the way of regular factory supplies.

THE "WANZER" SEWING MACHINE.

What a revolution in its special branch has the sewing machine caused, since Hood's famous "Song of the Shirt" was written. To-day there are but few households, however humble, but what can boast of the ownership of a sewing machine, and rich and poor alike count it as one of their most valuable posses-