

PLUMBING & SANITATION
FROM EARLIEST TIMES

Thomas Crapper



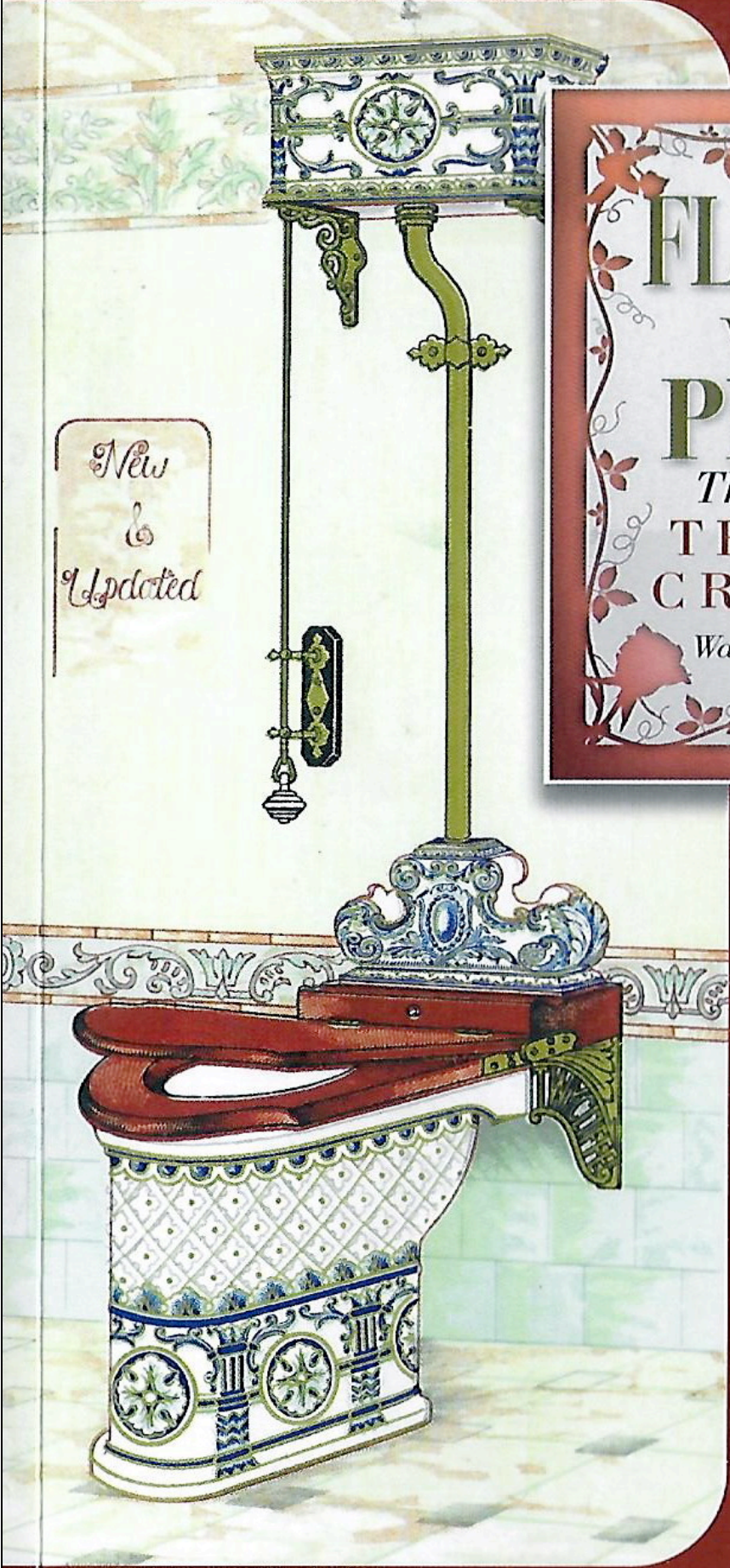
From the WALLACE REYBURN book 2009

New
&
Updated

FLUSHED with PRIDE

The story of
THOMAS
CRAPPER

Wallace Reyburn



THOS. CRAPPER & Co., Ltd.,

Sanitary Engineers

TO

His Majesty the King

AND

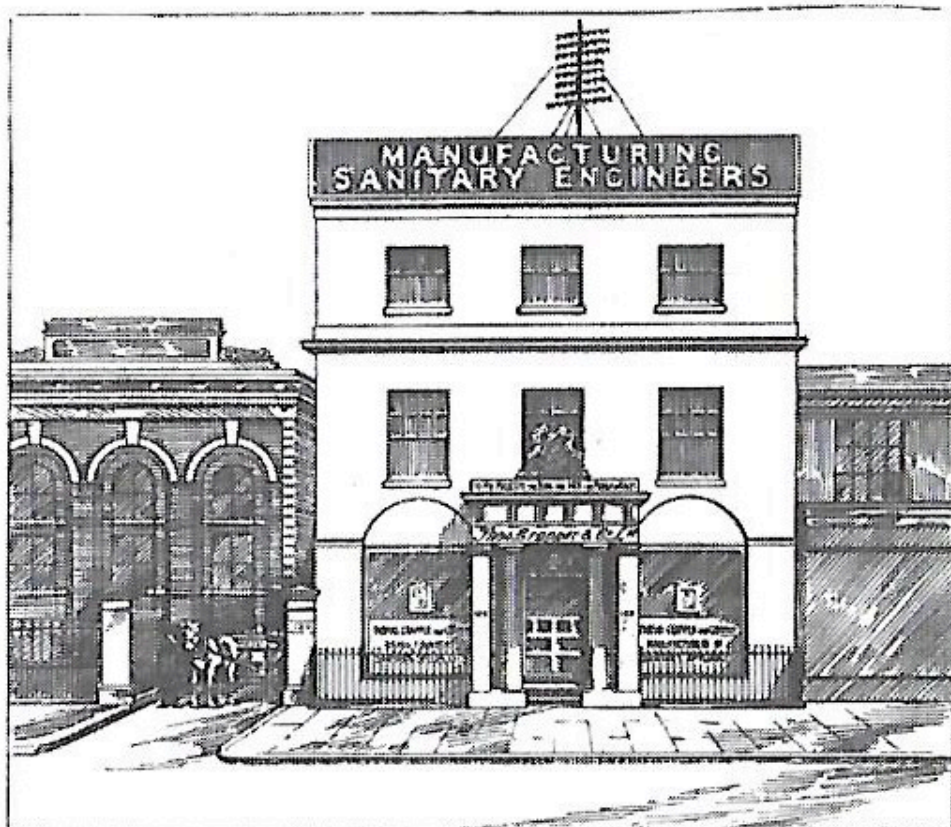
H.R.H. The Prince of Wales.



BY APPOINTMENT.



BY APPOINTMENT.



BATHS, LAVATORIES, SINKS, &c.

Show Rooms :

120, KING'S ROAD, CHELSEA, S.W.

(OPPOSITE ROYAL AVENUE.)

Chapter 2

The Chelsea Plumber

When young Crapper came to London in 1848 he got a job with a master plumber in Robert Street in Chelsea, the Royal Borough to which he was to remain loyal throughout his life. Robert Street was off the King's Road, directly opposite the Chelsea Town Hall.

In passing it should be mentioned that in that year of 1848, England's Great Man of cricket, W. G. Grace, was born. Which would appear to have no connection with Thomas Crapper. But, as will be seen later, the interesting thing is that they were to wind up close together.

Young Tom lived in the attic at Robert Street. In those days you lived where you worked or within walking distance. Considering that he was getting only four shillings a week, the penny omnibus was not for the working man, let alone the apprentice. Later in life he told a friend that a vivid memory from those young days was chapped hands and chilblains from constantly messing about with water and from the numbing cold when he would try to get some life back into his hands by holding them over the open grate. On the coldest winter nights he was allowed to take up to bed with him a hot brick from the oven wrapped in flannel.

He remembered being much impressed by the coming of electric light, which, if one looks back over their issues of 1848, was not the case with the *Illustrated London News*,

The light produced was of the most powerful character, but it is, in our opinion, still but a costly experimental toy, whose practicability forms a whole subject for conjecture,' commented that worthy journal.

Those old copies of the *Illustrated London News* reflect, more accurately, a turbulent world in that year of 1848 when the youthful Crapper came to the big city. Revolution in France, rebellions in Italy, Switzerland, West Germany, Austria and Poland, not to mention the Americans battling it out with the Mexicans ('How is the war to be carried on? How is it to be paid for?').

The Chartists, the working class people who wanted their voice to be heard, were the main troublemakers in England. At their 'monster demonstration' in Hyde Park on April 15, 1848, 'a double file of Metropolitan Police and Pensioners, under arms and fully accoutred,' were on hand to try to keep them under control in the area of Apsley House, 'where the bullet-proof shutters were up'. With the Chartist delegates shouting, 'We have held a meeting that had been forbidden and held down!' there were then 'symptoms of unruliness among the crowd that showed itself in violent rushes made from one point to another,' and 'the pressure of the concourse was so great that the lines of police were forced and many of them were carried along with the throng.'

There is no way of knowing whether young Tommy Crapper was present at this or any of the other demonstrations of more than a hundred years ago which had a strangely 1960s flavour about them. He would most certainly have been working the 64-hour week that the Chartists were complaining about but since there is no evidence of his having a militant streak one can only conclude he just got on with it, determined to make a go of it as a plumber.

The Chelsea in which he was soon to be working on his own had an abundance of the charm which, in much modified form, has still managed to survive. The river was the main

attraction. Before the construction of the Embankment in 1871 set up what was in effect a barrier between the buildings and the river, the river front blended in with the houses, the shops and the inns along Cheyne Walk. One could stroll along the bank of the river under stately trees, past rowboats and sailing craft drawn up on the sandy strip at the water's edge and if of ample means have one's own landing stage from which to set off downstream to Westminster on business or up the river for a pleasure trip.

It was no wonder that Chelsea proved such a magnet to artists and writers, such as Turner, Leigh Hunt and Thomas Carlyle. There is no record of Crapper clearing a clogged drain for Swinburne, repairing a kitchen tap for Whistler or installing a bidet for Christina Rossetti. But he might very well have done so, for they all lived a mere stone's throw from him and when they had the need of a plumber there is no reason why a maidservant should not have been dispatched to fetch Crapper.

In 1861, after 13 years of industrious work as a plumber, Crapper was able to set up in business for himself in nearby Marlborough Road as a Sanitary Engineer. The Marlboro' Works of Thomas Crapper & Co. (Telegrams, 'CRAPPER, CHELSEA') were at 50, 52 and 54 Marlborough Road but if you go there now you will see that the site has been swallowed up in a big block of flats, built in the 1930s. And while they were about it they changed the name of Marlborough Road, incorporating it into Draycott Avenue. The reason for this was that London had more Marlborough Roads than it knew what to do with. The British had been very proud of the Duke of Marlborough and in that era when the city was really spreading out, local boroughs hastened to have at least one street named after the general who had been victor of Blenheim, Ramillies, Oudenarde and Malplaquet.

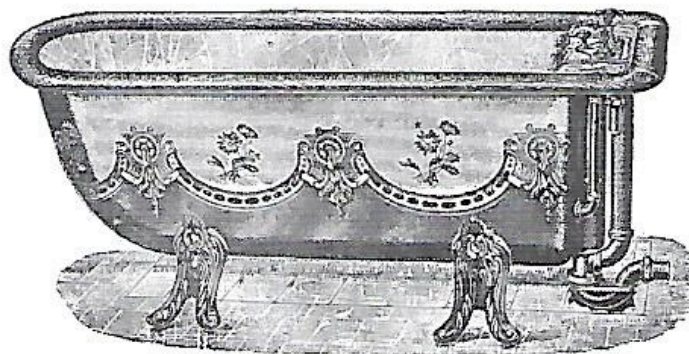
By the 1930s all the Marlborough Roads, Avenues and Streets were driving the Post Office crazy, so they set about having the name of some of them changed. Today there are still 33 Marlborough Streets in London.

Crapper could not have started up in business for himself at a better time. The year 1861 was to be the start of a boom period for plumbers, occasioned by the fact that London had, belatedly, just got its first two main sewers, which in the next four years were to be extended to a network of 83 miles of large intercepting sewers. Crapper, along with all the other plumbers, was happily inundated with work.

His outside staff were kept continually on the go; work poured in to his Marlboro' Works. It was a two-storey stucco building with an archway leading through to the yard and the brass foundry. Work from the foundry went upstairs to the brass finishing department and also upstairs were the offices and showrooms. The storage rooms were at the back of the ground floor, adjoining the shop, with its counter so high that it was at about eye level since in Victorian times customers could apparently not be trusted to keep their thieving fingers off the merchandise when the assistant was out in the back. And the main part of the ground floor (most important as far as we are concerned at any rate) was occupied by the cistern workshop from which such exciting new things were to emerge.

Independent Baths.

(With Silent Inlet Valves.)



Chapter 3

'Pull and Let Go' Is Born

Undoubtedly Thomas Crapper's greatest, most lasting contribution was the work he did in developing and promoting the modern W.C. cistern. He was prompted to turn his attention to this when new regulations came into force following the Government's Metropolis Water Act of 1871.

This piece of legislation had been essential, to clear up a terrible state of confusion. At that time there was not a single authority dealing with the whole of London's water supply as with the Metropolitan Water Board today. Eight separate water companies had the city divided up into sections and this was a terrible headache for the plumbers, since each local company had its own standards and requirements as regards water installations. Whenever their work took them from one area to another - from Chelsea, say, to Lambeth or central London - plumbers found that they had to conform to different regulations. The Metropolis Water Act was a big step towards unifying the whole thing. And one of the main regulations was aimed at curbing the shocking wastage of water that was going on in the lavatories of the metropolis.

In the old days the water for a flushing loo was provided from a cistern in which there was a valve at the outlet to the flushpipe. When you pulled the chain it simply lifted up that valve and released the water. In other words you just pulled the plug out. Some people would tie the chain down so that the valve was perpetually open and the water flowed ceaselessly

- either because they were too lazy to pull the chain every time or because they were ultra-fastidious and wanted to ensure an immaculate flushing of the bowl.

This sort of thing horrified the Board of Trade, which used to be the ministry responsible for our water supply. They envisaged enough people doing it to cause all the reservoirs to dry up, and drought and pestilence could strike the land.

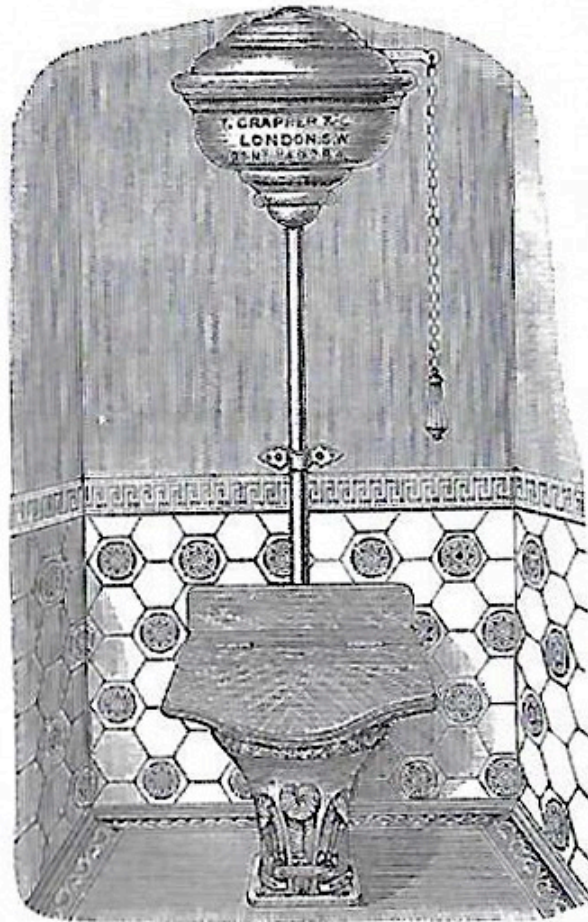
But even worse was the second factor, although it would have seemed to have been of lesser importance. This was the fact that try as they might the makers of the valves could not ensure a snug fit. Each valve would start off watertight but it would not be long in use before it was failing to lodge properly after each flush. Grit and limescale in the water made this worse, just as it does with valve-type flushing devices in use across the world today. This trickle, multiplied by thousands, was the Board of Trade's big worry. So the call went out for somebody to evolve a 'Water Waste Preventer'.

It would not be absolutely true to say that it was Thomas Crapper who *invented* the Water Waste Preventer, which for many years was to be the technical term for what is now our modern W.C. cistern, or more precisely, the syphon device within it. It was not as clear-cut as, say, Diesel inventing the engine which bears his name. More than a few plumbers took up the challenge and just as a hundred years previously the work of James Watt and others had culminated in his producing the 'first effective modern steam engine', so it was that there came into being 'Crapper's Valveless Waste Preventer. One Moveable Part only. Certain Flush with Easy Pull. Will Flush When Only Two-thirds Full.' In other words he perfected the cistern as loo users throughout Britain know it today.*

* Regrettably, since 2001 a version of the old 'valve', albeit improved, has been re-legalised and is taking over, despite the superiority of the waste-preventing 'syphon'. (See Foreword)

Improved
Registered Ornamental Flush-down W.C.

New Design
Water Waste
Preventer.
Reversible
Action.



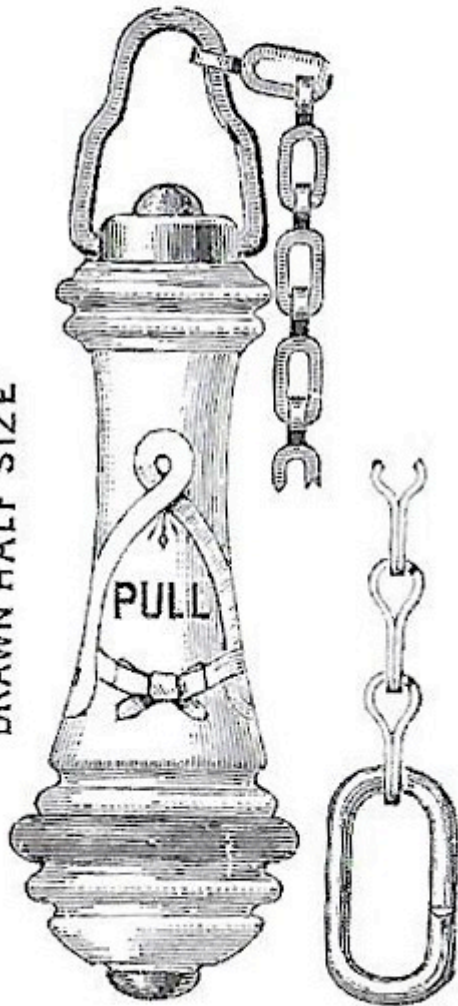
No Brackets
required.
No Unions
or Joints
in Sight.

No. 165.

No. 165. Improved Ornamental Flush-down W.C. Basin (Registered No. 145,823),
Polished Mahogany Seat with Flap, New Pattern 3-gallon Cast-iron
Syphon Cistern (Registered No. 149,284), and Pendant Pull, complete
as shown £5 14 6

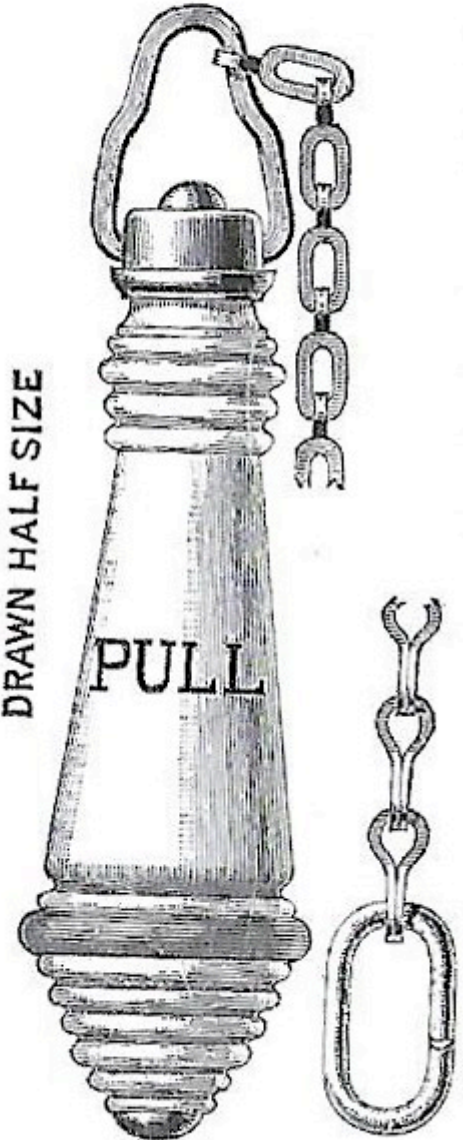
Cistern Pulls.

DRAWN HALF SIZE

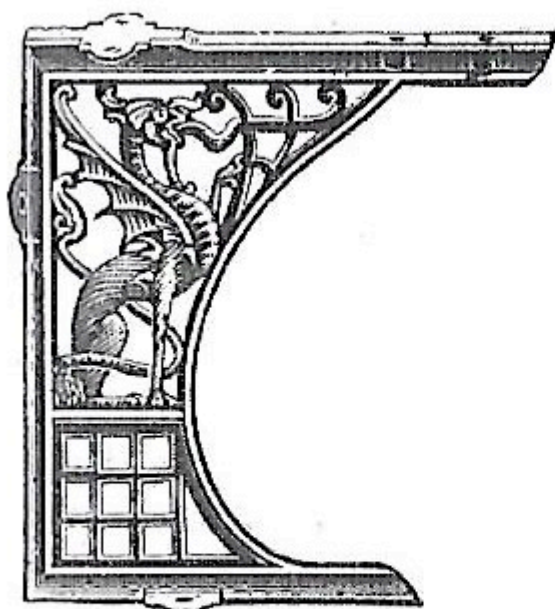


No. 231

DRAWN HALF SIZE



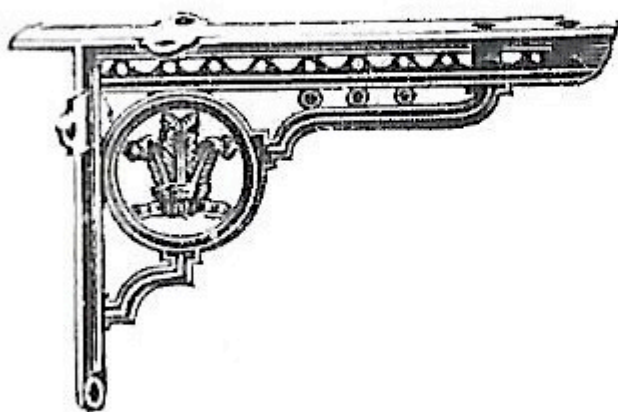
No. 232



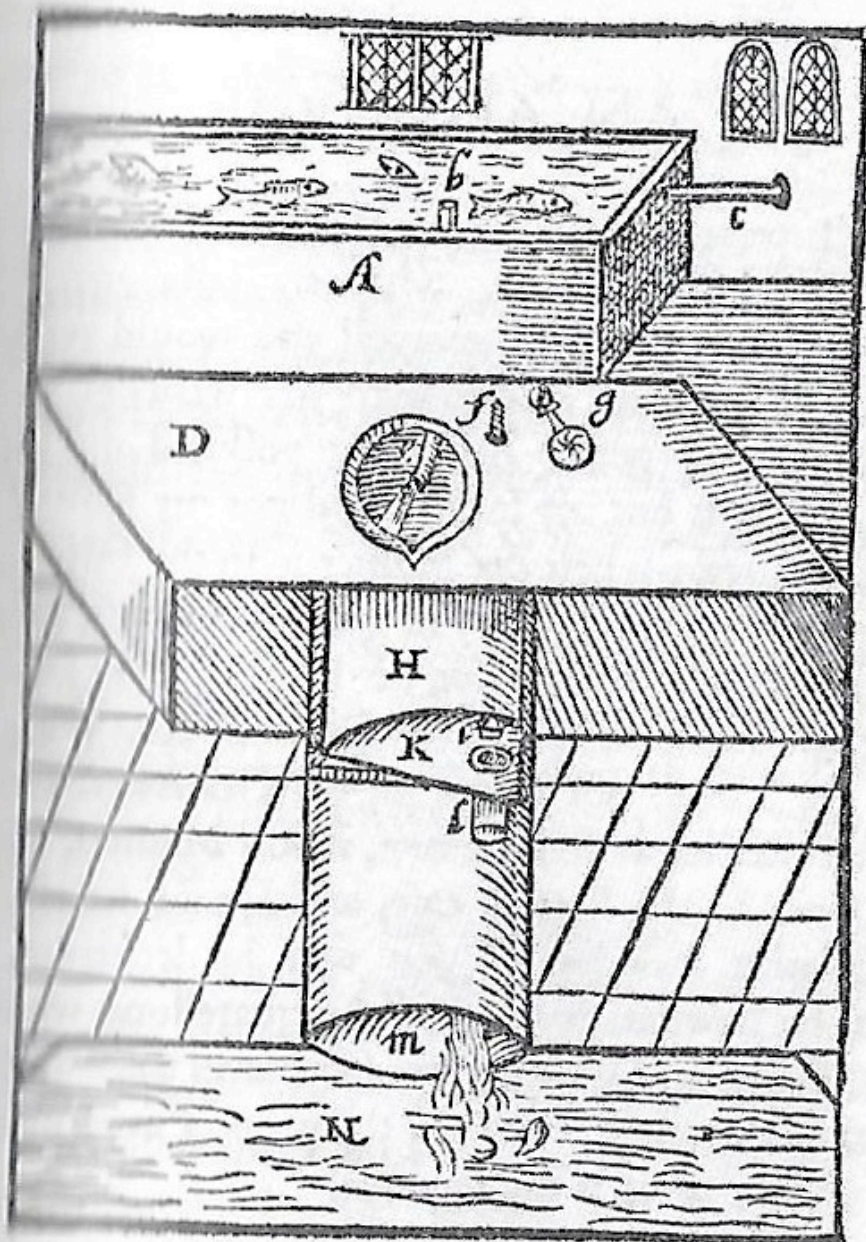
No. 792.

Seat Pedestals, per pair 6/9

Galvanized do. „ 12/6

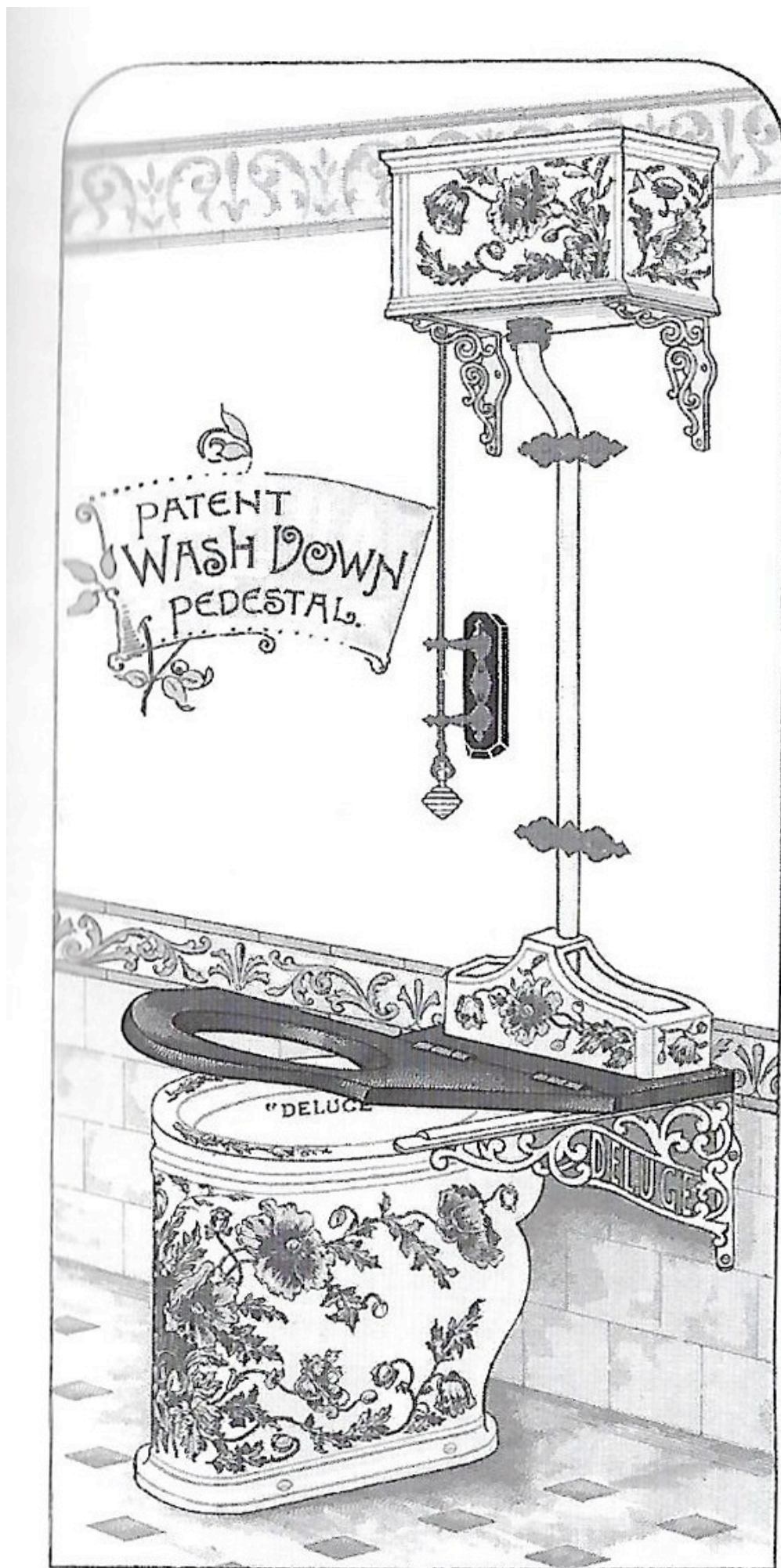


No. 794



A. the Cesterne.
 B. the litle washer.
 C. the wast pipe.
 D. the seate boord.
 E. the pipethat comes from the Cesterne.
 F. the Screw.
 G. the Scallop shell to couer it when it is shut downe.
 H. the stoole pot.
 I. the stopple.
 K. the current.
 L. the sluice.
 M.N. the vault into which it falles: alwayes remember that () at noone and at night, emptie it, and leaue it halfe a foote deepe in fayre water. And this being well done, and orderly kept, your worst priue may be as sweet as your best chamber. But to conclude all this in a few wordes, it is but a standing close stoole easilie emptied.
 And by the like reason (other formes and proportions obserued) all other places of your house may be kept sweet.

Sir John Harington's W.C. of 1592



An early Twyford W.C. with siphonic cistern

*Pedestal Lion Closet,
1896*



*The Sultan with
decoration, 1896*



*Improved Aeneas with
raised ornamentation*



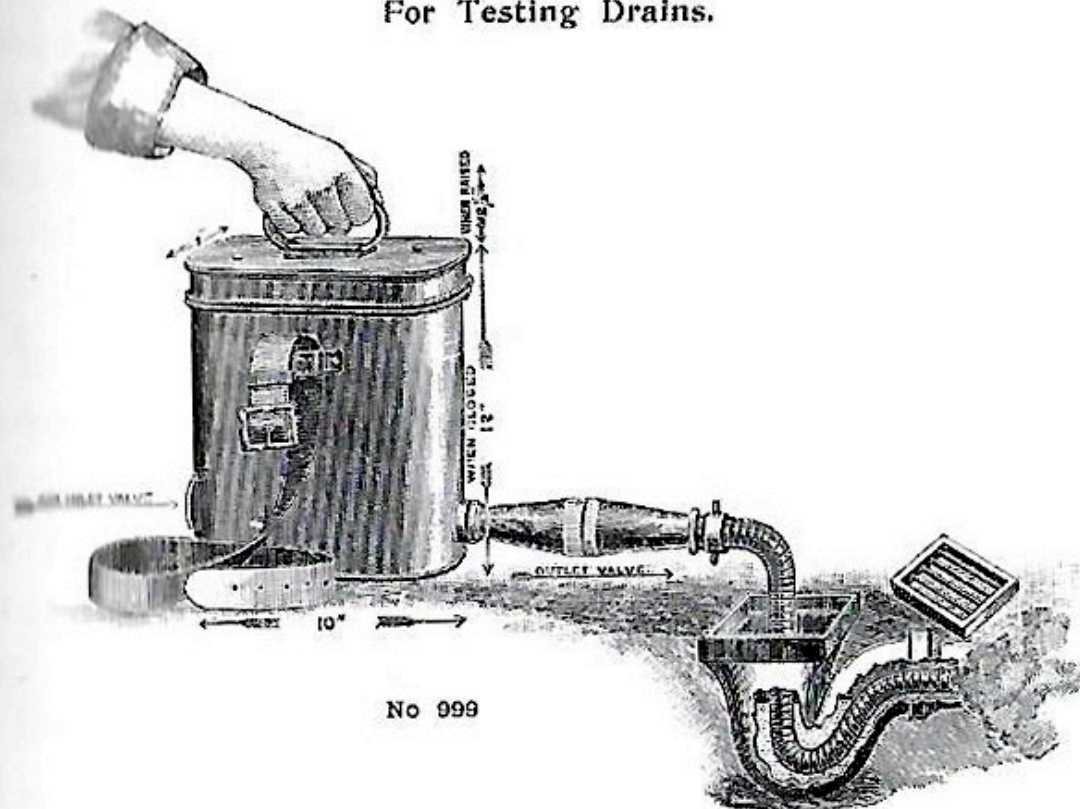
The Dolphin, 1884



*Sanitation in the Middle Ages,
from an old woodcut*

Patent Air Pump and Smoke Generating Machine,

For Testing Drains.



No 999

Patent Air Pump and Smoke Generating Machine, made of strong polished copper ... £4 7 6

EXTRAS

Special Flexible Tubing (India-Rubber) ...	per foot	2/-	Specially prepared Smoke Material (Oiled Cotton Waste)	to smoulder in machine	per cwt. 18/6	
" " (Steel) ...	"	3/6				
Brass Connection ...	"	2/6				
			"	"	Paper (Carbonized) ..	per lb. 5d.



No. 1000

No. 1000. Kemp's Patent Drain Testers
10/6 per doz.

No. 1499. Patent Drain Testers
7/6 per doz.

Smoke Rockets 8/6 per doz.

FULL SIZE OF TESTER

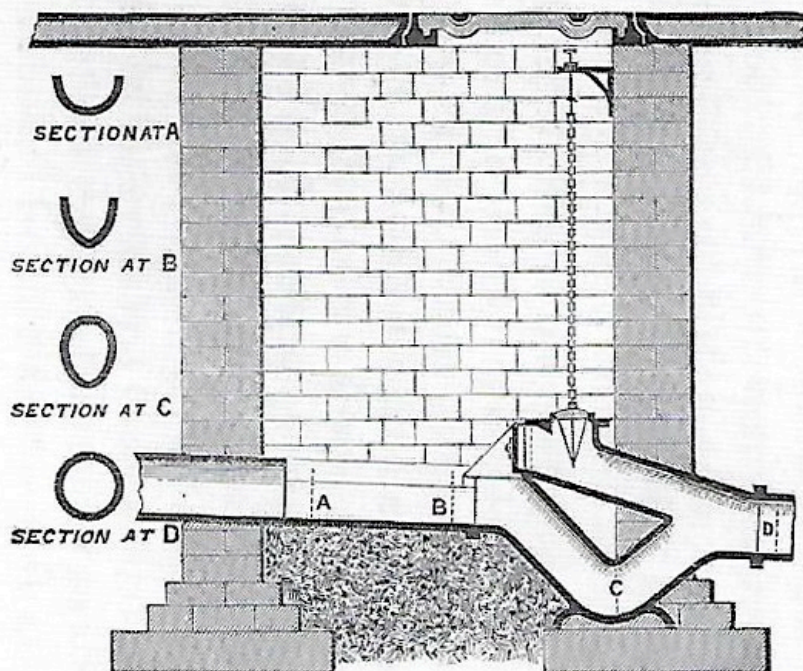


No. 1499

Reg. Trade Mark No. 81,187, "The Improved Kenon, Thomas Crapper & Co."

Advantages:—Provision at upper part of Trap for discharging into sewer any accumulation caused by accidental stoppage.

Easy access to passage for sweeping purposes, by means of a suitable brass cap with screw.



4-in. 4 to 6-in. 6-in. 9-in. 12-in.

No. 506	The Improved Kenon Trap,	of Glazed Stoneware							
	with gun-metal valve, galvanized iron chain, pull and bracket, and brass screw cap	...	...	...	3 1/6	33/-	35/-	40/6	94/6
	If Trap glazed white inside,	Extra	...	...	3/9	4/-	4/6	8/3	—
	„ „ white inside and out	„			7/6	8/-	9/-	16/6	—

THOMAS CRAPPER & CO.,

PATENTEES AND MANUFACTURERS

... OF ...

Sanitary Appliances.

ENGINEERS BY APPOINTMENT TO

His Majesty the King

... AND ...

H.R.H. The Prince of Wales.



MARLBORO' WORKS, CHELSEA, LONDON, S.W.

Show Rooms and Offices:—

50, 52, & 54 MARLBOROUGH ROAD, CHELSEA, S.W.

CATALOGUE AND PRICE LIST,

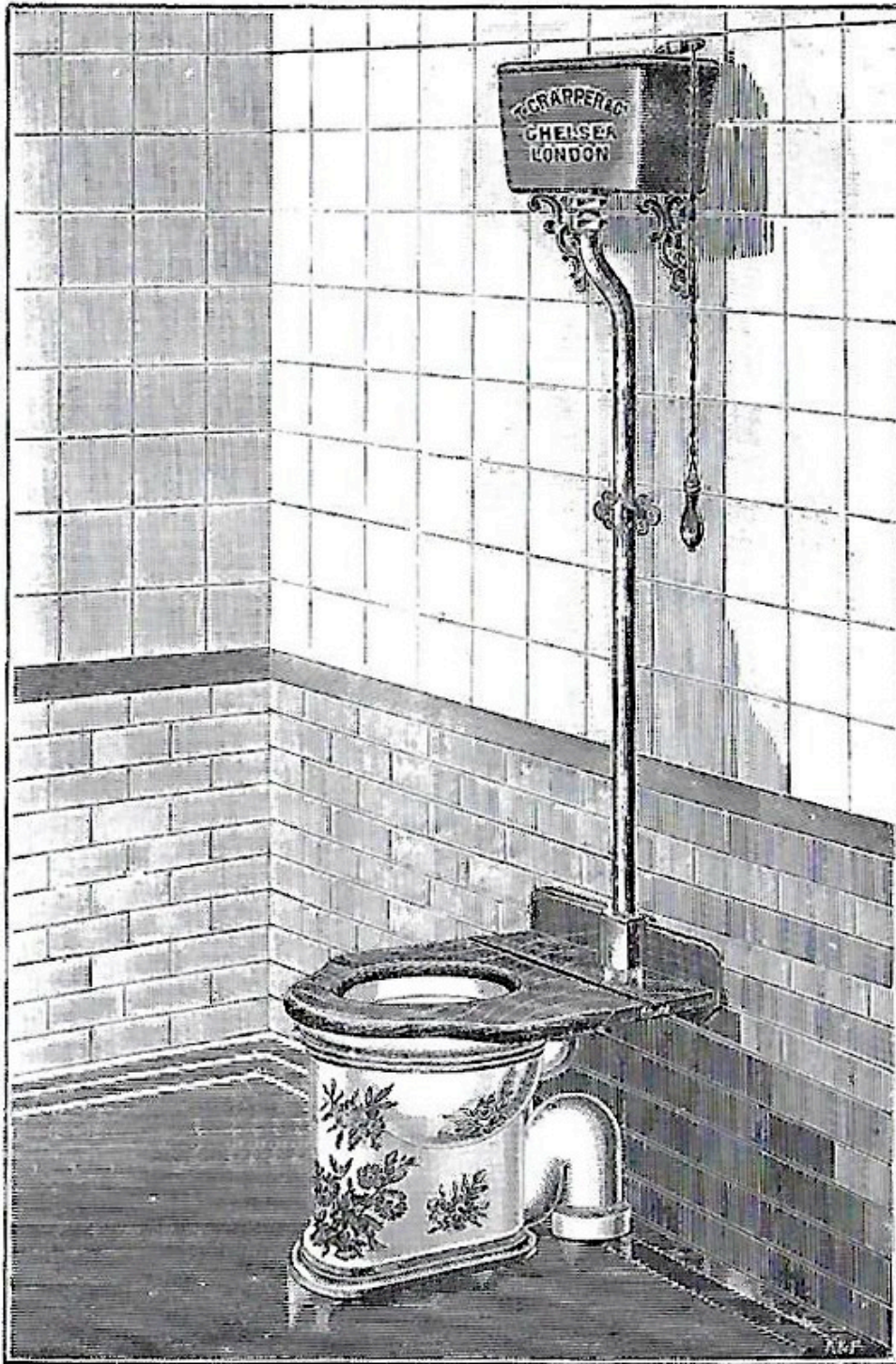
MAY, 1902.

(Subject to alterations without notice.)

ALL PREVIOUS ISSUES CANCELLED.

The "INVICTAS"

Combination No. 5

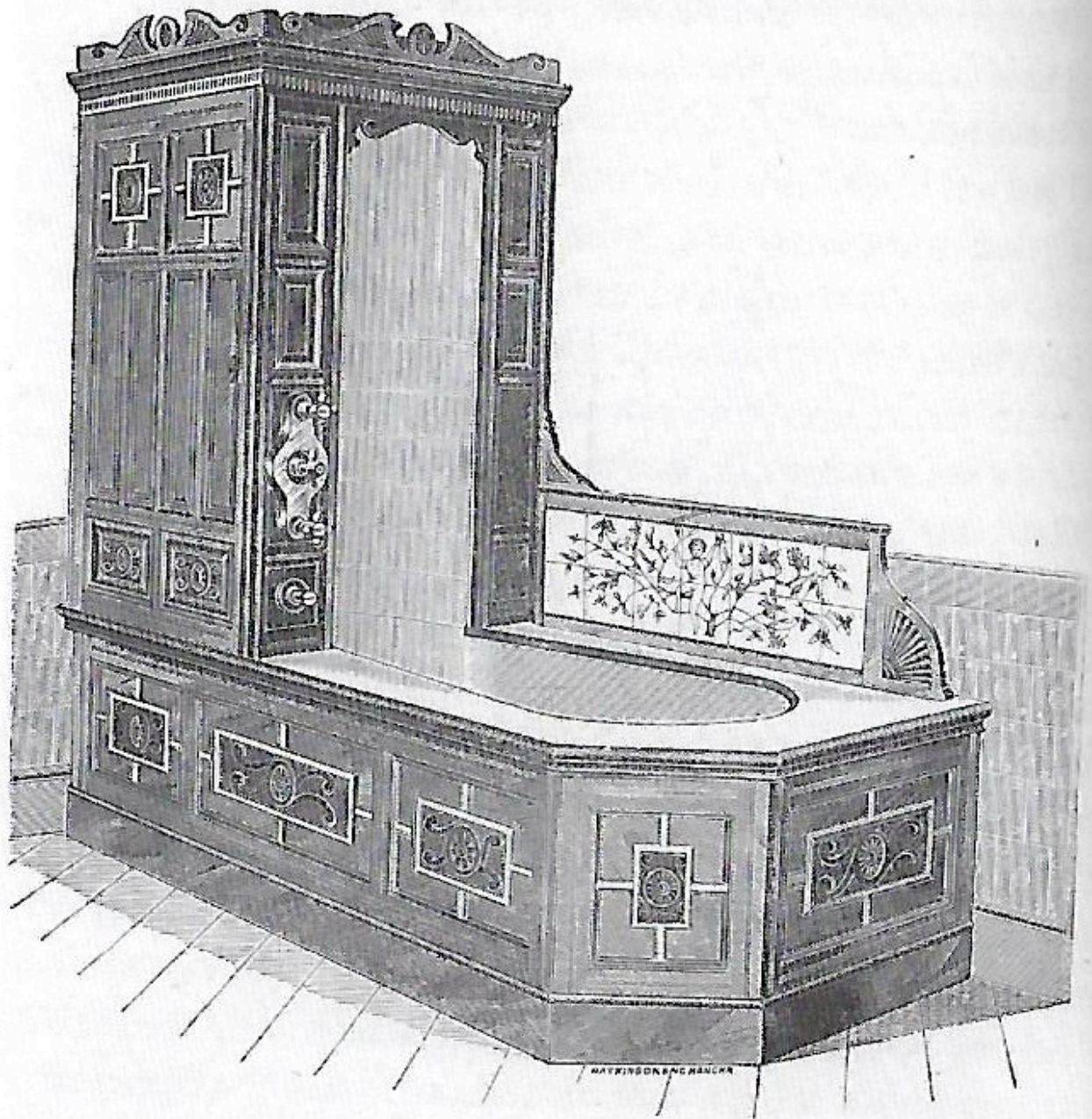


No. 5 Combination, comprising White and Printed "Invictas" Closet, with Fig. 211 Polished Mahogany Seat and Back Board, and 2 Gallon Fig. 219 Water Waste Preventer with $1\frac{1}{2}$ in. Fittings, Preventer with $1\frac{1}{2}$ in. Fittings, and China Pull and Brackets

Plain White 4/6 less.

THOMAS CRAPPER & COMPANY, Ltd.

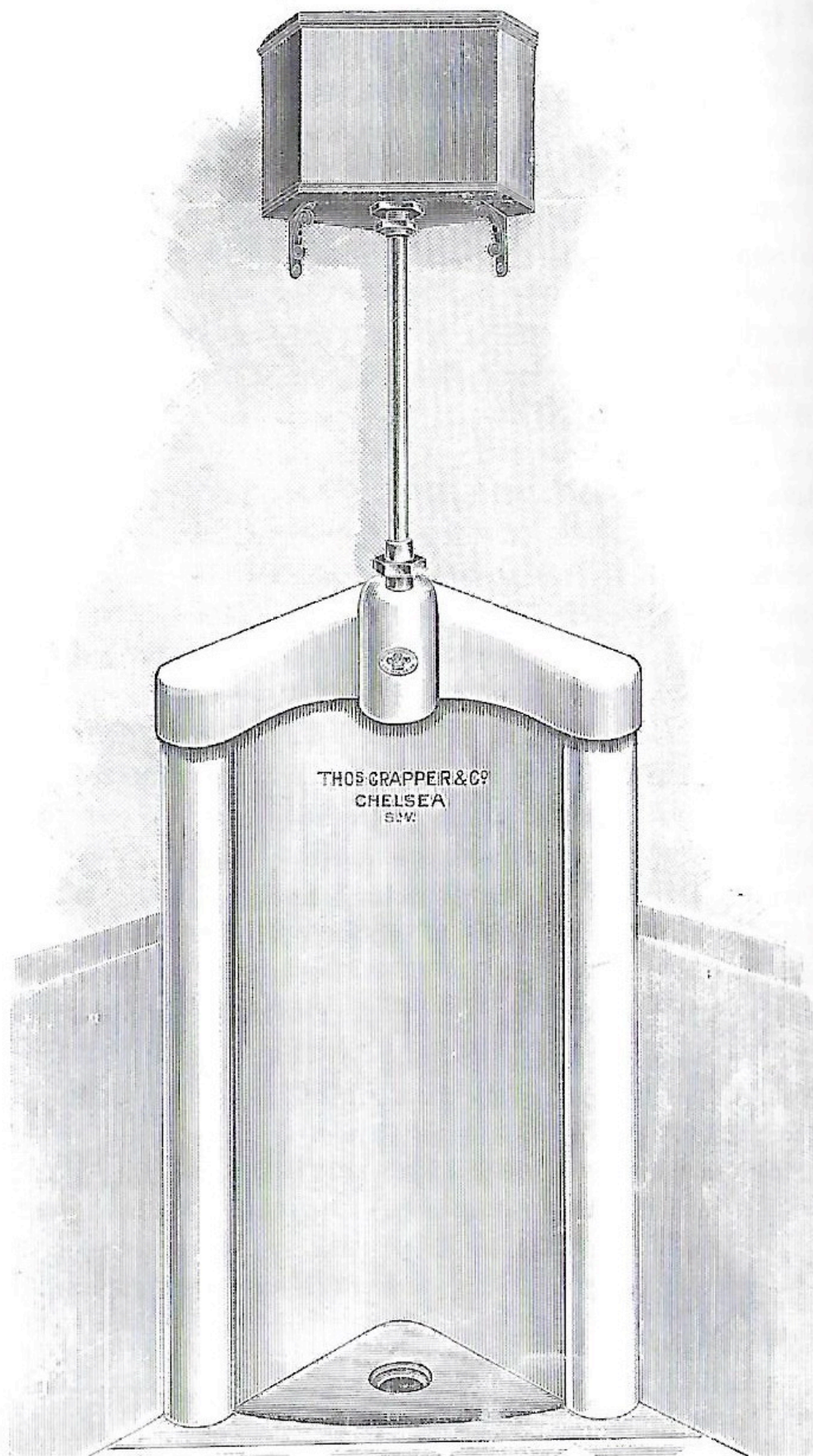
Spray Bath with Enclosure.



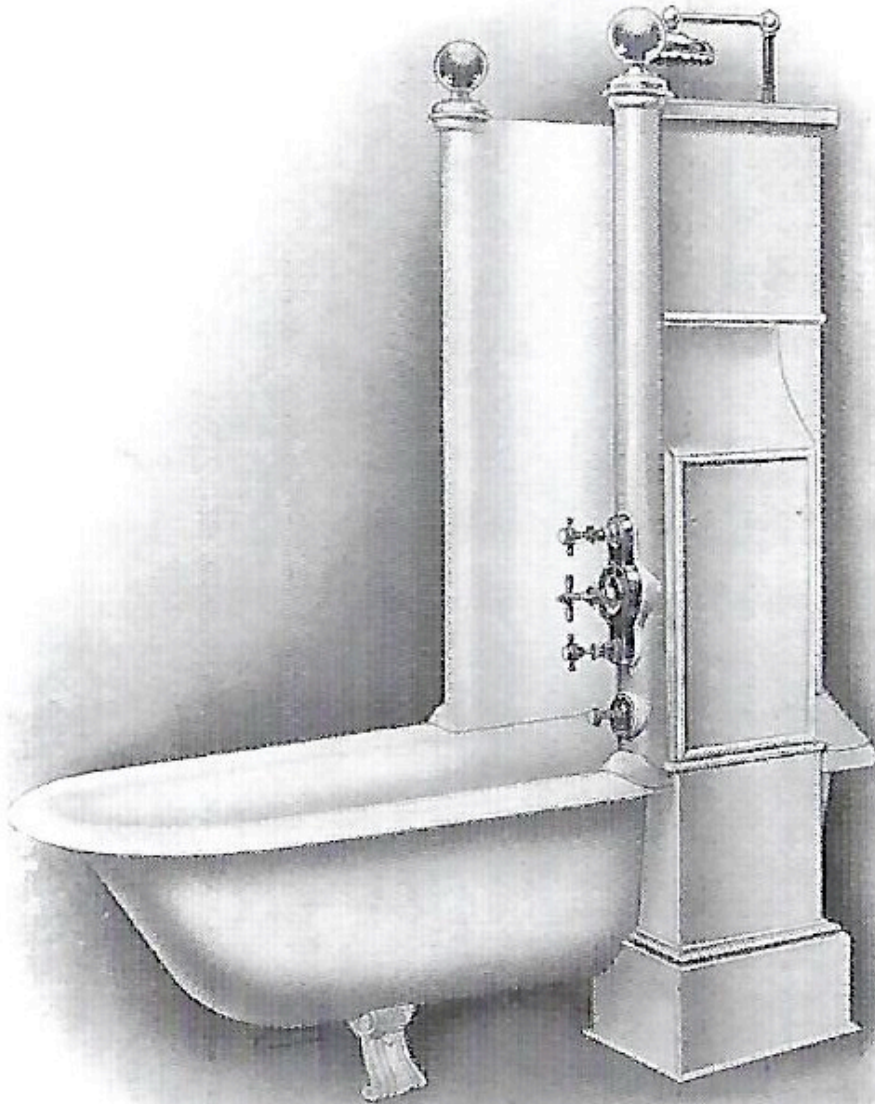
No. 1.

No. 1. 6ft. Cast Iron Bath, Enamelled inside, with Galvanized Supply and Waste Pipes, Spray Enclosure with Shower and Douche in Copper, Combined Hot and Cold Nickel-plated Supply Valves; and with Best-made Mahogany or Walnut Enclosure and Hand-painted Tiled-back Skirting, no connecting Lead Piping ... £78 17 6

Fire Clay Angular Urinal.



Porcelain Enamelled Cast Iron Canopy Bath.



No. 1250.

No. 1250. 5 ft. 6 in. Parallel Bath, Porcelain Enamelled inside, Metallic Enamelled out, 4 in. Roll, with Metallic Enamelled Zinc Canopy as shown, 1 in. Gun Metal Valves for Hot and Cold, with Plunge, Spray and Shower, Pull-up Waste at sides, with Trap, £26 12 6.

Wave Fittings, £1 13 3 extra. Rising Spray and Jet Fittings, £4 1 9 extra.
Douche Fittings, 1 13 3 " Plated Fittings ... 0 12 6 "

Height over all 7 in. 8 in. Length over all 6 ft. 3 in. Width over all 3 ft.

Can also be supplied reverse hand.