

15000 PIPET, GAS TESTING

For rubber tubing and stopper connection.

15010 BURET, GAS, NON-CONDENSIBLE GAS TESTER

Volume from stopcock to etch mark, .025 ml., total volume from stopcock to four circular openings at top, 225 ml. Graduated as follows: 1 ml. in 0.1 ml.; 2 and 3 ml. in 0.2 ml.; 4 to 6 ml. in 0.5 ml. divisions.

15020 BURET, GAS FOR PRESSURE TESTS ON BOTTLES OR CANS

Graduated from 0 to 4 ml. in 0.05 ml., from 4 to 15 ml. in 0.2 ml., from 15 to 30 ml. in 1.0 ml. divisions. With Straight stopcock, § No. 2.

15030 NITROGEN BURET

Graduated from 0 to 88 ml. in 1 ml. divisions and 88 to 100 ml. in 0.1 ml. divisions.

Capacity, ml. 100

15040 OXYGEN BURET

Graduated from 94 to 98 ml. in 0.1 ml. divisions and from 98 to 100 ml. in 0.05 ml. divisions. Stopcock is § 2.

Capacity, ml. 100

15050 OXYGEN BURET

Graduated from 0 to 94 ml. in 1 ml. divisions, 94 to 99 ml. in 0.1 ml. divisions and from 99 to 100 ml. in 0.05 ml. divisions.

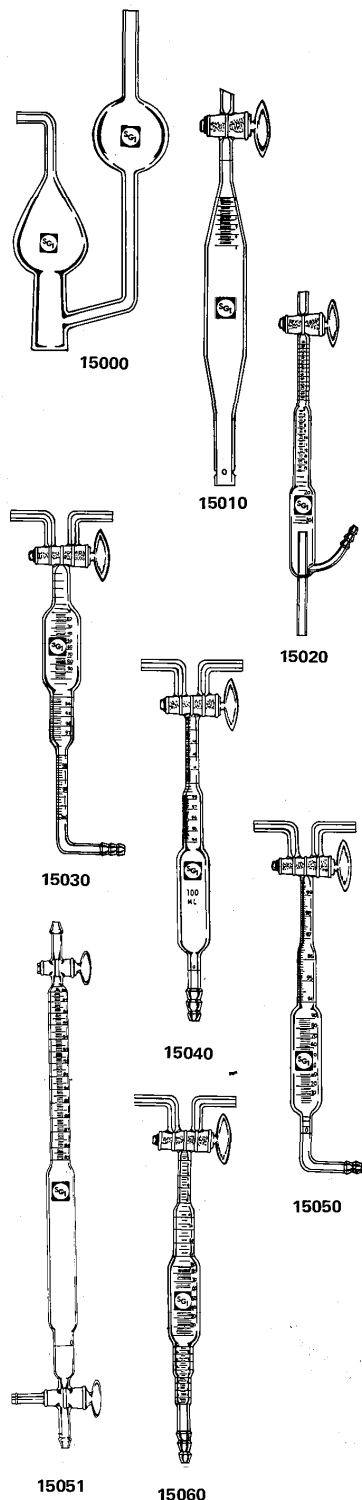
Capacity, ml. 100

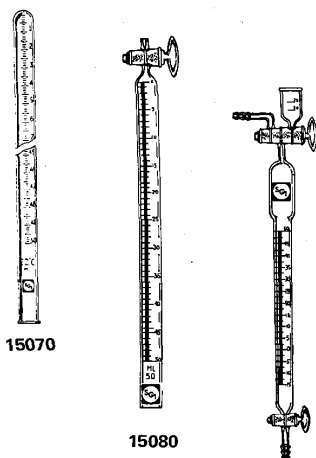
15051 GAS BURET

Used for determination of chlorine gas in fertilizer. Amber stained. Restricted section graduated from 85 to 99 ml. in 0.1 ml. divisions.

15060 GAS BURET

Graduated 0 to 1 in 0.05 ml. divisions, 1 to 2 in 0.1 ml. divisions, 2 to 10 in 0.5 ml. divisions, 10 to 90 in 5 ml. divisions, 90 to 98 in 0.5 ml. divisions, 99 to 100 in 0.1 ml. divisions.





15070

15080

15090
15091

15070 BURET

Gas Measuring Tubes, Bunsen.

Size	Capacity, ml.	Subdivisions, ml.
A	50	0.1
B	100	0.2

15080 GAS MEASURING TUBE, BUNSEN TYPE

Graduated tube is open at bottom.

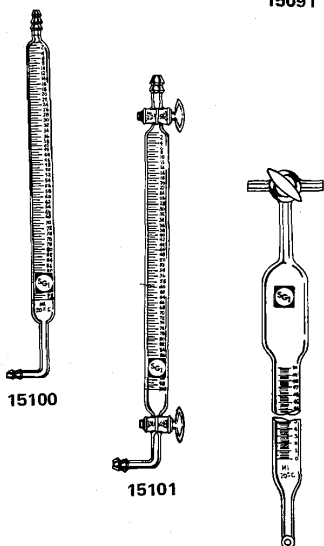
Code	Capacity ml	Divisions ml
A	50	0.1
B	100	0.2

15090 GAS BURET, BUNTE, WITH GLASS STOPCOCKS

Upper bulb contains 50 ml. Lower section is graduated from 50 ml. to 0 and below this from 0 to 15 ml. in 0.2 ml. divisions.

15091 GAS BURET, BUNTE, WITH TEFLON® STOPCOCKS

Same as 15090 except with Teflon® stopcock.



15100

15101

15110

15100 GAS BURET, HEMPEL, 100 ml.

Graduated from 0 at top to 100 ml. at bottom in 0.2 ml. divisions.

15101 GAS BURET, HEMPEL, 100 ml.

Graduated 100 ml. between stopcocks in 0.2 ml. divisions. Lower stopcock has outlet through back of plug.

15110 GAS BURET, WITH GLASS STOPCOCK

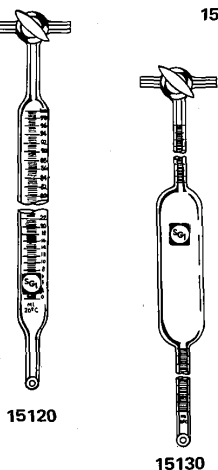
Upper bulb is 50 ml. capacity. Lower section is graduated from 0 to 50 ml. in 0.2 ml. divisions. Total volume is 100 ml.

15120 GAS BURET, WITH GLASS STOPCOCK

Graduated from 0 to 100 ml. at stopcock in 0.2 ml. divisions.

15130 GAS BURET, WITH GLASS STOPCOCK

Total volume is 100 ml. with top portion graduated from 97 to 100 ml. in 0.05 ml. divisions and lower section graduated from 0 to 3 ml. in 0.05 ml. divisions.



15120

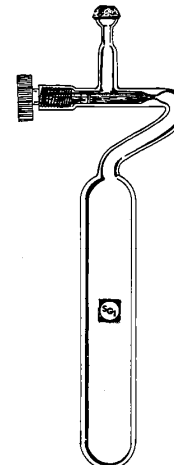
15130

15140 GAS BURET, PORTABLE, 100 ml.

Upper bulb contains 70 ml. graduated into 0.5 ml. divisions. Lower 30 ml. section is divided into 0.2 ml. divisions.



15140



15180

15180 GAS COLLECTING TUBE

This tube is designed for collecting samples for introduction into Gas Chromatographs. It is fitted with a Teflon[®] needle valve and a 12/5 ♂ Ball Joint.

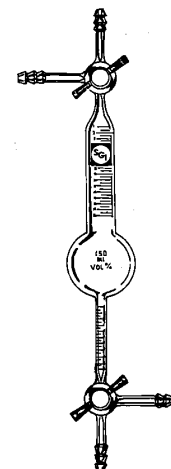
Part	Capacity, ml.
A	25
B	50
C	100

15181 GAS SAMPLING BURET, 100 ml.

This buret was designed for the determination of undesirables in industrial gases, and is also used for the determination of chlorine samples. Teflon[®] stopcocks are 2mm bore.



15181



15182

15182 GAS SAMPLING BURET, 150 ml., CO₂

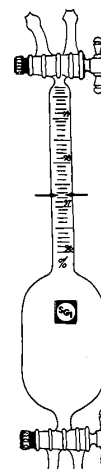
This buret is used in the determination of CO₂ in commercial fertilizers. It is supplied with 2mm Teflon[®] stopcocks. The buret is calibrated in percent of total volume. The upper portion is calibrated to 16% of the total volume and the lower portion is calibrated to 1.2% of total volume. The lower arm is numbered upside down for easier reading when the buret is inverted.

15183 COMBUSTION PIPET, 500 ml.

Used in the determination of nitrogen in chemical fertilizers. Amber glass. Graduated from 96 to 100 ml. in 0.1 ml. divisions. 500 ml. capacity.



15183



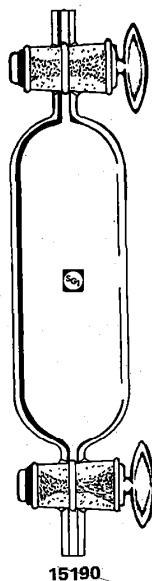
15184

15184 COMBUSTION PIPET, 500 ml.

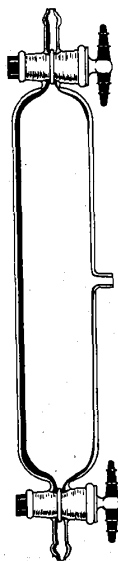
Same as 15183, except with tungsten electrodes.



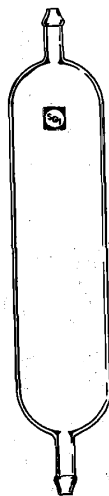
15186



15190



15191



15192

15186 GAS BURET

Used for determination of chlorine in chemical fertilizers. Restricted section is graduated into 3 ml. with .02 ml. divisions. Available mounted on a clear plexiglass stand or without stand.

Code	Item
A	Buret
B	Stand
C	Complete

15190 GAS COLLECTING TUBE, GLASS STOPCOCKS

15190-T GAS COLLECTING TUBE, TEFLON® STOPCOCKS

Gas collecting tube with two capillary stopcocks sealed close to container to prevent trapping gases.

Code	A	B	C
Size, ml.	125	250	500
Stopcock Bore, mm.	2	4	4

15191 GAS COLLECTING TUBE, GLASS STOPCOCKS

Same as 15190 except with side outlet (septum)

15191-T GAS COLLECTING TUBE, TEFLON® STOPCOCKS

Same as 15190-T except with side outlet (septum)

15192 GAS COLLECTING TUBE

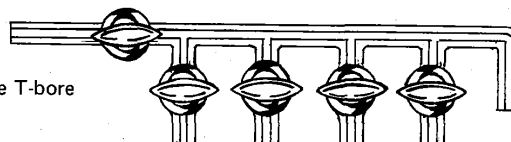
Similar to 15190 except without stopcocks. Used with rubber tubing and pinch clamps. Most economical sampling tube on the market.

Ref. ASTM D1605.

Code	A	B	C
Size, ml.	125	250	500

15240 GAS MANIFOLD

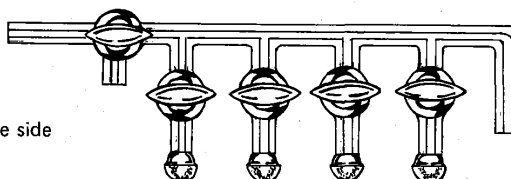
Capillary tubing manifold with four straight bore stopcocks and one T-bore stopcock.



15240

15250 GAS MANIFOLD

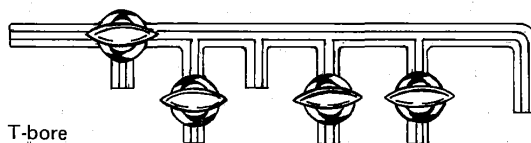
Similar to 15240, except with four $\frac{1}{2}$ ball joints terminating the side arms of each straight stopcock.



15250

15260 GAS MANIFOLD

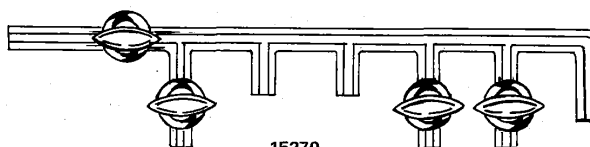
Capillary tubing manifold with three straight bore stopcocks, one T-bore stopcock and one outlet without stopcock.



15260

15270 GAS MANIFOLD

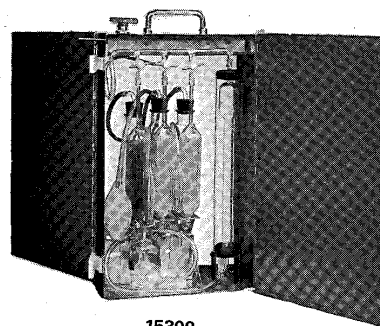
Capillary tubing manifold with three straight bore stopcocks, one T-bore stopcock and two outlets without stopcocks.



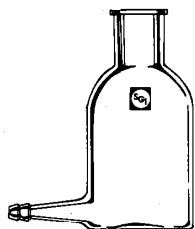
15270

15300 GAS ANALYSIS APPARATUS, ORSAT *

Used for the analysis of CO, CO₂ and Oz in Flue Gases. Consists of stainless steel cabinet, three absorber/bubblers, leveling bottle, 100 ml. buret with water jacket, inlet valve and manifold with Teflon stopcocks.



15300



15330

15330 LEVELING BOTTLE

Capacity 125 ml., with outlet at the bottom shaped to hold rubber tubing. Used with the burets in the portable case, also with the slow burning pipets.



15340

15340 LEVELING BULBS, CAPACITY 250 ml.

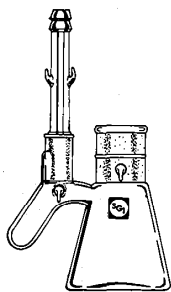


15350

15350 LEVELING BULBS, CAPACITY 125 ml.

15370 WARBURG MANOMETER, "PYREX" BRAND GLASS

Unmounted, without flask or support.



15390

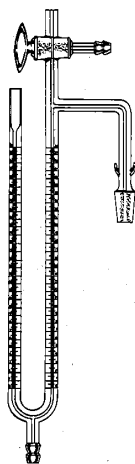
15390 WARBURG REACTION FLASKS

Capacity 15 ml. with F 7/15 vented plug on side bulb and glass hooks on both joints for retaining springs. Supplied without springs.

F Center Neck

14/26

17/20



15370

15391 WARBURG REACTION FLASKS

Capacity 30 ml. with F 17/20. Glass hooks for retaining springs. Supplied without springs.



15391

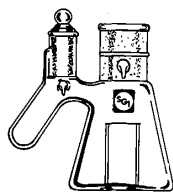
15400 WARBURG REACTION FLASKS

Capacity 15 ml. with F 7/15 glass stopper on side bulb and an internal cylindrical well 20 mm. deep. Both joints equipped with glass hooks for retaining springs. Supplied without springs.

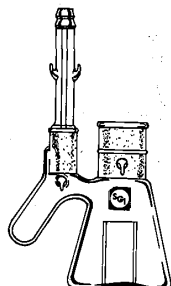
F Center Neck

14/26

17/20



15400



15410

15410 WARBURG REACTION FLASKS

Same as 15400, but with F 7/15 vented plug on side bulb, instead of glass stopper. Supplied without springs.

F Center Neck

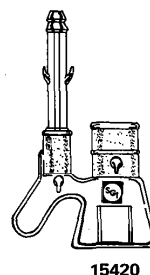
14/26

17/20

15420 WARBURG REACTION FLASKS, MICRO

Identical with 15410, but 7 ml. capacity and cylindrical well 15 mm. deep. Supplied without springs.

⌘ Center Neck
14/26
17/20

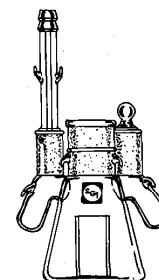


15420

15430 WARBURG REACTION FLASKS

Same as 15410, but with two side bulbs, one with ⌘ 7/15 vented plug equipped with glass hooks for retaining springs and the other with ⌘ 7/15 glass stopper. Supplied without springs.

⌘ Center Neck
14/26
17/20

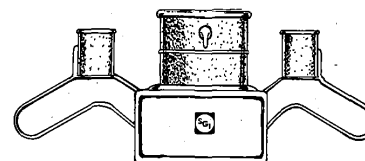


15430

15431 WARBURG REACTION FLASKS

Similar to 15430, except the body is made of rectangular tubing for photosynthesis determination.

⌘ Center Neck
14/26
17/20

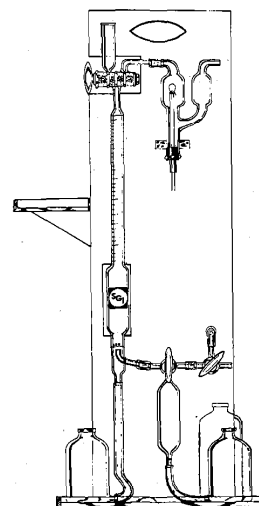


15431

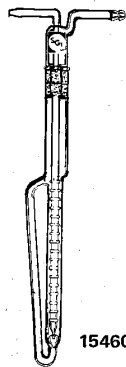
15440 GAS ANALYSIS APPARATUS

For measurement of Air and Hydrogen content of Chlorine Gas. Used with horizontal Mercury Chlorine cell. Mounted on a clear Plexiglas stand. The apparatus consists of a special 100 ml. Buret graduated in 0.1 ml. divisions. Bottom of buret is connected to a 500 ml. Leveling Bottle for 25% Sodium Hydroxide solution. Lower side arm of buret connects to 100 ml. capacity pipet which is attached to a 300 ml. Leveling Bottle for saturated brine. A three-way stopcock joins the pipet to chlorine inlet and outlet tubes. The outlet tube passes through the stand to three 500 ml. widemouth bottles for absorption of Chlorine. Top stopcock of buret connects to the combustion bulb into which a Gas Pipet is placed. A bracket at the rear of stand holds a 250 ml. leveling bulb for forming a liquid (brine) seal in the combustion tube.

Part	Description
A	100 ml. Buret
B	Combustion Bulb
C	100 ml. Capacity Pipet
D	Connecting Stopcock
E	500 ml. Leveling Bottle
F	300 ml. Leveling Bottle
G	500 ml. Absorption Bottles (3)
H	250 ml. Leveling Bottle
I	Stand only
J	Complete



15440



15460

15460 GAS ABSORPTION BUBBLER

Used in the micro-determination of Gases. The design is based on the rod and disc principle with a tube replacing the rod. The discs are ground flat on the outer edges to achieve a uniform distance from the wall to the disc edges.

Reference: CHEMISTRY AND INDUSTRY, May 3, 1962; H. A. Kamphausen.

Part	Description
A	Bubbler Body
B	Dispersion Tube
C	Complete



15480

15480 GAS CELL, I.R.

Infrared gas cell made with Borosilicate body and fused Silica windows. Tube is 14 mm x 205 mm. Inlet arms are 125 mm apart.



15481

15481 GAS CELL, I.R.

Similar to 15480 except cell size is 25mm x 150mm. Inlet arms are 20mm from ends.