April 28, 1964 C. M. MAYER ETAL 3,130,719

GAS RANGE

Filed Feb. 3, 1960 5 Sheets-Sheet 1

FIG. 1

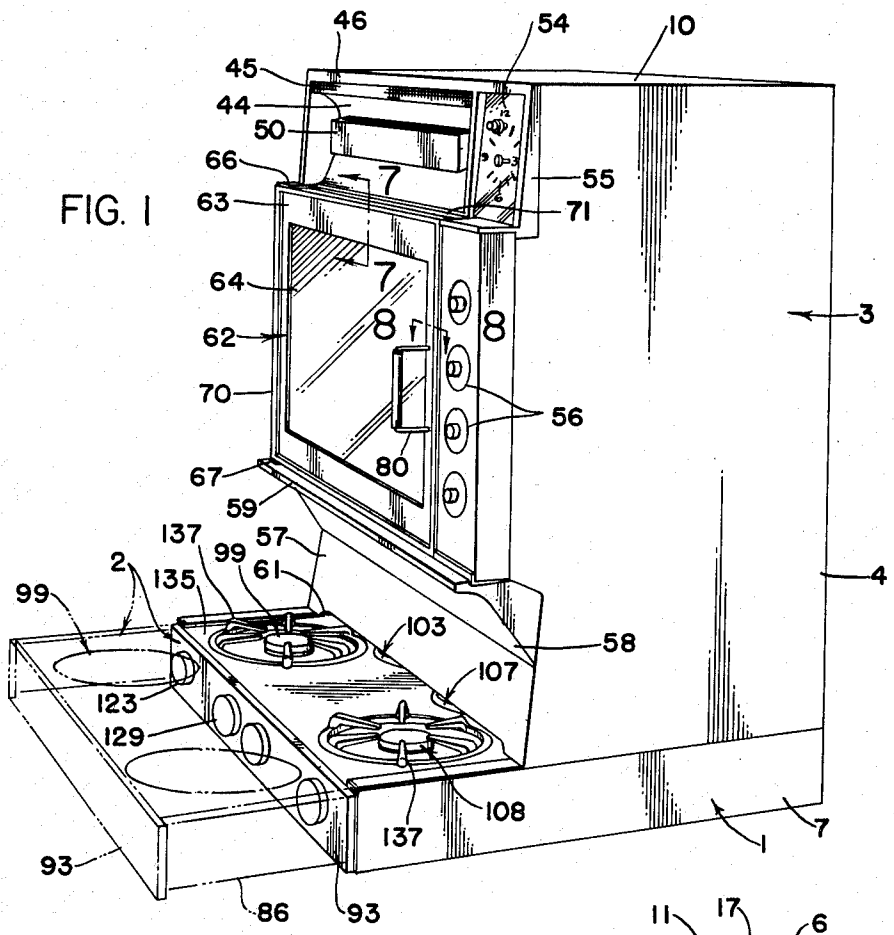


FIG. 5

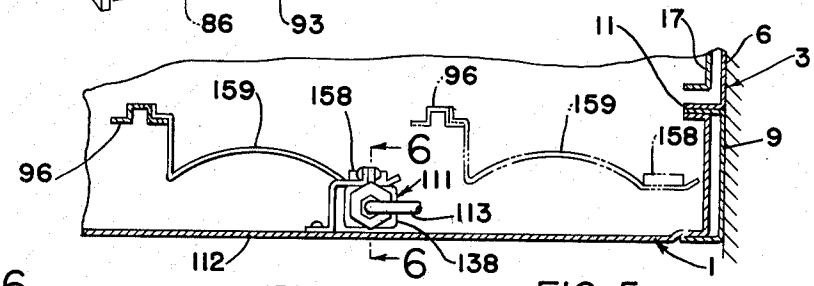
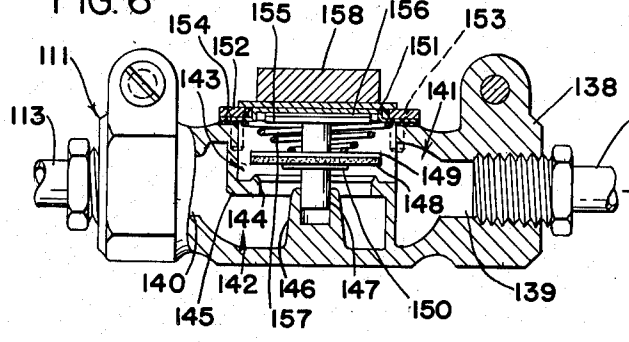


FIG. 6



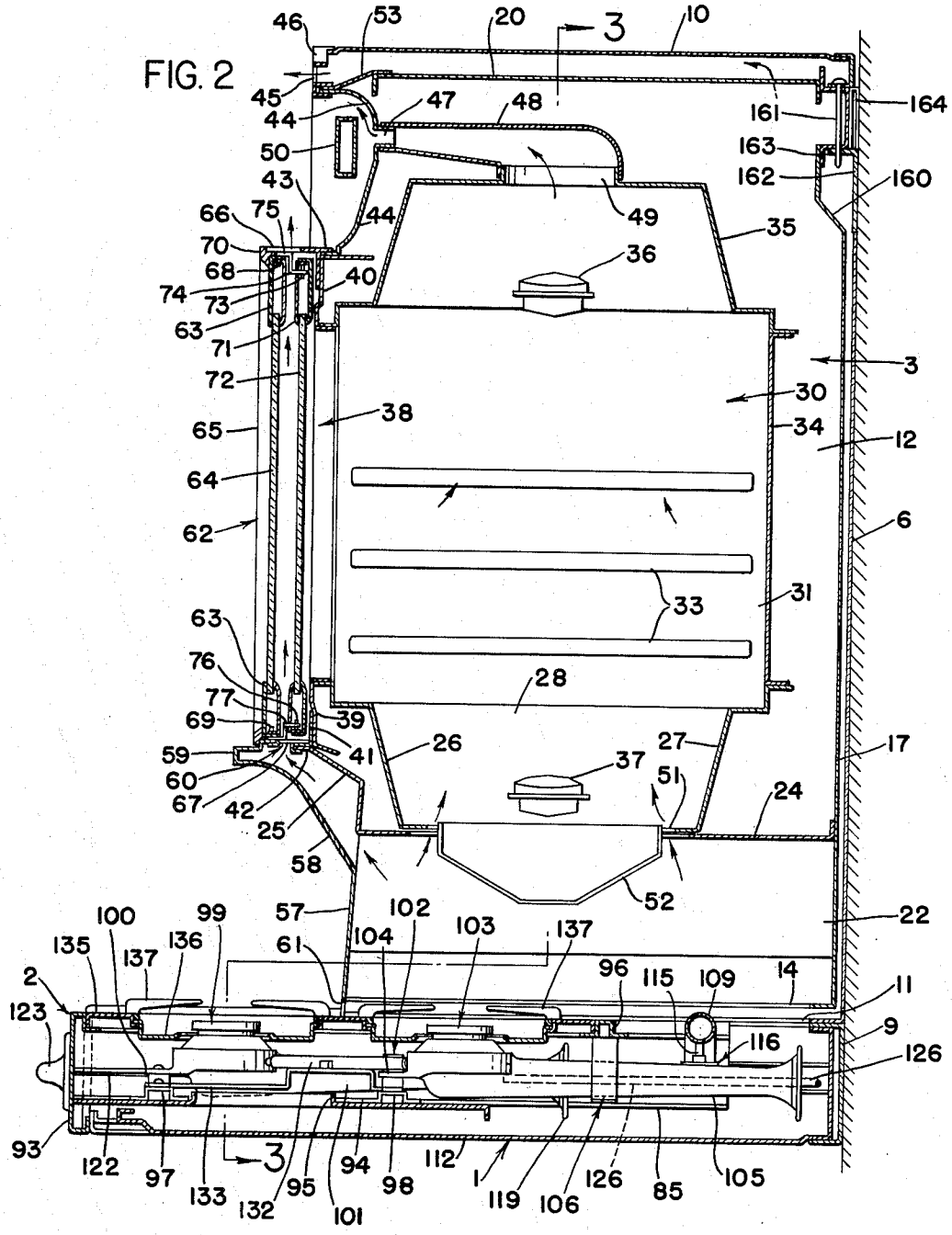
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GAS RANGE

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FIG. 2



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GAS RANGE

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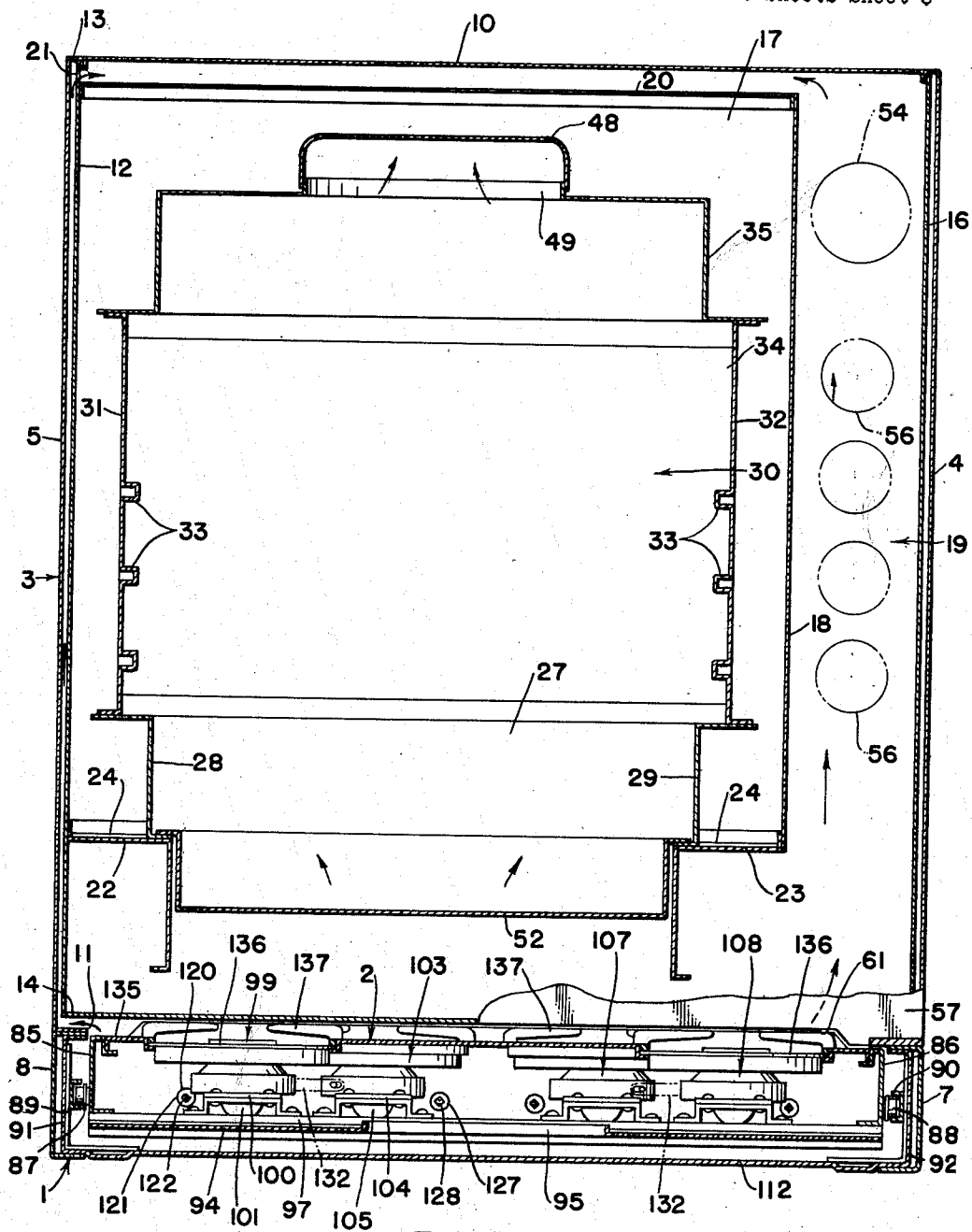


FIG. 3

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GAS RANGE

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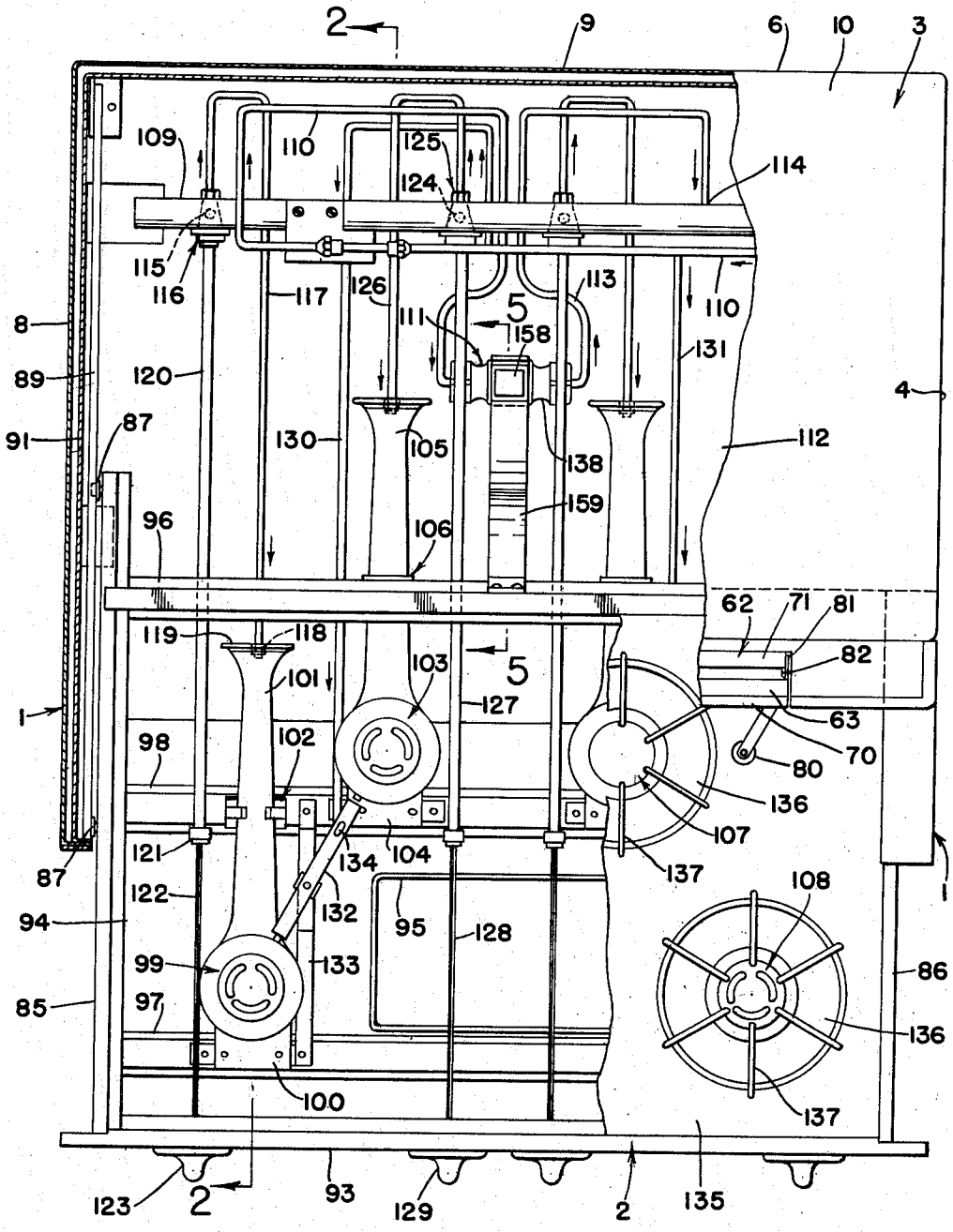


FIG. 4

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FIG. 7

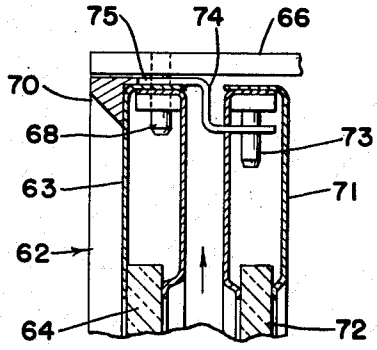
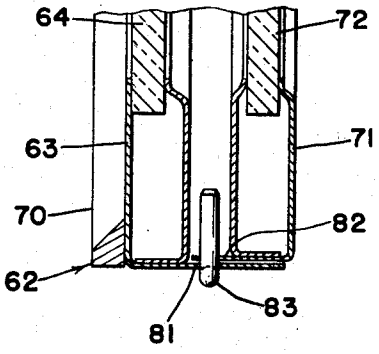


FIG. 8



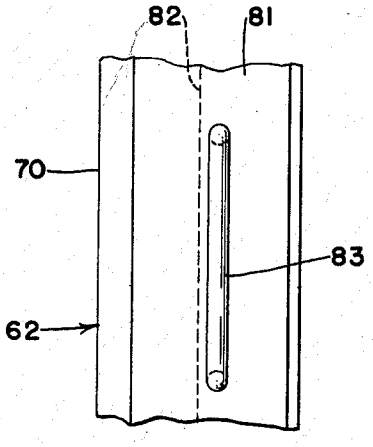


FIG. 9

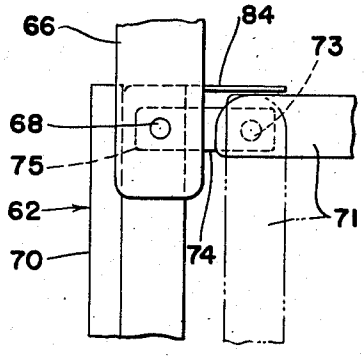


FIG. 10

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3,130,719

GAS RANGE

Charles M. Mayer, Erwin C. Dalenberg, and Frederick G. Constance, Mansfield, Ohio, assignors to The Tappan Company, Mansfield, Ohio, a corporation of Ohio

Filed Feb. 3, 1960, Ser. No. 6,428
6 Claims. (Cl. 126—37)

This invention relates to gas ranges and has for a primary object the provision of such a range in which the oven is elevated above the surface burner assembly for general eye level location in the unit as installed.

Another object is to provide such a range having passages for convection currents so placed and directed as to afford a predetermined and advantageous circulation of air through the unit while operating, with this system and the oven proper both being vented or exhausting at the front so that the range can, if desired, be fully or partially surrounded by cabinet structure as for example in a kitchen cabinet wall without requiring special vents and the like.

In side profile, the new range is of general L-shape, with the surface burner section constituting the base thereof, and the range may be installed on a separately provided base cabinet of any desired design or hung on the kitchen wall at an elevation to place the surface burner assembly in each case approximately at waist height. The upstanding section of the range, in which the oven is located, is necessarily quite deep and the forwardly projecting portion of the base section which is normally exposed to form an always accessible cooking top area is of a depth which conveniently accommodates one row of surface burners. The frontal width of the unit thus determines the number of surface burners which can be provided in such area, and if the range is wide enough, the usual four burners can readily be disposed therein extending along the front in a single row.

It is a further principal object of the present invention to provide a gas cooking top assembly in the new range in the form of a drawer or horizontally sliding shelf, whereby the normally available cooking top area discussed above is provided by the outer exposed portion of the drawer when in its innermost position and this area is substantially increased by extension of the drawer. Such an arrangement reduces the burner number dependence on the width of the unit, so that the usual four burners can be provided in a smaller size range, and a construction on this order has been illustrated in the accompanying drawings and will be described hereinafter in detail.

As will be seen from such disclosure, the sliding movement of the new gas cooking top is provided by a particular structural assembly which has been found to be both reliable and economical, and incorporated therein is a special control operative to cut off the flow of gas to the burners automatically in response to initial inward movement of the drawer from its extended position, such control making the supply available to the burners only when the drawer is fully extended.

It is an additional object of the invention to provide the oven of such range with an improved door of the type incorporating window means for inspection of the oven interior with the door closed. One of the features of this door concerns, in the preferred range structure, the elimination of condensation which would tend to obscure the window means, and another feature greatly facilitates cleaning of the window means.

Other objects and advantages of the present invention will become apparent as the following description proceeds.

To the accomplishment of the foregoing and related ends, the invention, then, comprises the features hereinafter fully described and particularly pointed out in the claims, the following description and the annexed drawings

setting forth in detail certain illustrative embodiments of the invention, these being indicative, however, of but a few of the various ways in which the principle of the invention may be employed.

In said annexed drawings:

FIG. 1 is a perspective view of the new range, showing in phantom lines the open condition of the burner drawer thereof;

FIG. 2 is an enlarged vertical section taken approximately on the line 2—2 in FIG. 4, but with the burner drawer closed;

FIG. 3 is a section taken on the line 3—3 in FIG. 2;

FIG. 4 is a plan view with parts broken away to illustrate the burner drawer in its open condition;

FIG. 5 is a section taken on the line 5—5 of FIG. 4;

FIG. 6 is a section taken on the line 6—6 in FIG. 5;

FIG. 7 is a fragmentary section taken on the line 7—7 of FIG. 1;

FIG. 8 is a fragmentary section taken on the line 8—8 of FIG. 1;

FIG. 9 is a fragmented end elevation of the oven door; and

FIG. 10 is a broken top plan view of the door at its upper pivotal connection, with the complemental sections of the door shown separated.

Referring now to the drawings in detail, the range fully illustrated in FIG. 1 will be seen to comprise a horizontal base section 1 in which there is a burner drawer designated generally by reference numeral 2, the full lines showing the drawer closed and the open position thereof being indicated by the phantom outline. Extending upwardly from this base section, and unitary with the same, there is an oven section 3 which is, at the plane of attachment to the base section, of such area and disposition as to cover somewhat more than half of the base section longitudinally at the rear of the same.

The outer two side walls 4 and 5 and the rear wall 6 of such oven section are coplanar with the corresponding walls 7, 8 and 9 respectively of the base section, and the former, together with the top wall 10, constitute an outer casing or enclosure which is, to this point, open at the front and also at the bottom. The front is substantially completely closed by structural components to be described, but the bottom opening indicated at 11 in FIG. 2 remains unobstructed to provide full communication between the base and oven sections where the two are attached about their corresponding sides by securing together inturned terminal and abutted flanges thereof in any suitable manner.

As best shown in FIG. 3, there is a partition or wall 12 spaced inwardly a short distance from the wall 5 of the outer casing, with the former extending to the outer top wall 10 as shown at 13, but being spaced at its lower edge 14 above the bottom flange of such side wall 5. A similar partition or inner wall 16 is spaced from the other outer side wall 4 of the casing, with the same relative proportioning and disposition, and a rear inner wall 17 (FIG. 2) is provided in this spaced relation over the major area of the back 6 of the outer casing. Returning to the front exposure provided by FIG. 3, there is an intermediate transverse partition 18, to the right of center in this view, spaced appreciably from the inner wall 16 at such side to define therewith a vertically extending chamber 19 adapted to receive the various controls provided for the oven. The upper edge of this partition 18 is spaced from the outer top wall 10, while its lower edge is elevated considerably above the bottom of the oven section. An inner top panel 20 in a horizontal plane coincident with the upper edge of the intermediate partition 18 closes off the area bounded by such edge, the inner rear wall 17, and the opposed side wall 12, with the latter above such panel being slotted as shown at 21 for communication

between the space at this side defined by the outer and inner walls 5 and 12 respectively and the space between the outer top 10 and the panel 20; it will also be clear that the latter space is in communication with the upper end of the control chamber 19 at the other side of the unit.

Two angular supports 22 and 23 extend fore-and-aft in the lower portion of the oven section, the support 22 extending inwardly and then downwardly, as viewed from the front, from the inner side wall 12 and the other support being correspondingly arranged along the bottom edge of the intermediate partition 18. The top panel 20, the intermediate partition 18, the opposed inner side wall 12, the rear inner wall 17, and the supports 22 and 23 will thus be seen to form an inner casing open at the front and at the bottom. Such bottom or lower end is bounded at the rear by a plate 24 extending from one side support to the other and at the front by a strip 25 of the cross-sectional shape shown clearly in FIG. 2, from which it will be seen that the strip 25 extends upwardly from the supports 22 and 23 at a slight inward angle and then forwardly and upwardly. Such lower assembly supports an oven bottom having downwardly converging front and rear walls 26 and 27 and vertical side walls 28 and 29, and an oven liner 30 is attached to and in turn supported on the upper peripheral flange of such bottom piece. This liner provides oven side walls 31 and 32 having glides 33 for rack support formed therein and a back 34. An oven top 35 is attached about the upper edge of the liner 30, and it will be seen that this top is of substantially the same size and shape as the oven bottom piece, relatively inverted in the assembly, whereby fabrication of the oven is obviously greatly facilitated. As indicated schematically in FIG. 2, an upper or broil gas burner 36 is disposed in the top portion of the oven and a lower or bake burner 37 in the bottom portion, these burners and the mountings thereof being conventional and accordingly not illustrated in detail.

A rectangular peripheral frame 38 is disposed about the front of the oven, extending outwardly at all sides from the front edges thereof, the bottom extent 39 of such frame being shown in FIG. 2 as bridging between the front edge of the oven bottom and the cross strip 25, while the upper frame portion is shown at 40 in such figure. It will be understood that at the respective sides of the oven front, the frame 38 provides similar out-turned surfaces. An angle strip 41 secured to the upper flange 42 of the previously described strip 25 forms cooperably therewith a forwardly projecting bottom ledge, and a trim strip 43 of T-shaped cross-section extends across the top of the frame there to provide a similar ledge.

With particular reference to FIG. 1, it will be seen that there is an inwardly curved piece 44 extending from the left wall horizontally across the top of the oven. A narrow perforated strip 45 is secured along the upper edge of such piece 44, and a trim member 46 which extends across the entire top of the oven section 3 closes the relatively small remaining space between the top 10 of the outer casing and the upper edge of the strip 45.

A fairly long horizontal slot 47 (FIG. 2) is formed in the curved piece 44, and a flue 48 leads from a central opening 49 in the oven top 35 to such piece at this slot, whereby the oven is vented through the latter. An elongated flue deflector 50 extends across the curved piece 44 spaced in front of the slot 47 to direct the gases and vapors issuing from the oven and such vent connection upwardly as indicated by the arrow.

Air for combustion at the oven burners is supplied through the lower portion of the oven section 3 of the range and the opening 51 in the oven bottom, and a heat shield 52 is suspended in such bottom opening to extend beneath the bake burner 37. Such shield is supported at its ends and of reduced transverse extent with respect to the opening in the oven bottom to leave air passages at the front and rear of the same. The space within the inner casing and around the various component parts of the oven is filled with a suitable insulating material, not shown, such as glass wool, including the forward spaces between the front walls of the oven top and bottom and the outer members respectively opposed thereto, so that the entire outer periphery of the oven assembly is thus insulated. At the front top, the space between the actual front of the oven section and the forward edge of the inner top panel 20 is bridged by a closure strip 53.

The oven is conventionally provided with a clock 54 housed in the top right corner, with appropriate trim 55 therearound, and other rotary controls 56 shown in simplified fashion in FIG. 1. For purposes of the present invention, the controls being of suitable available type for regulation of the oven operation in usual manner, it is significant only to note that these elements extend vertically along the right side of the oven section of the range and are accordingly housed in the chamber 19, as shown by the dashed line representations in FIG. 3.

Across the lower front portion of the oven section 3, there is a finish plate 57 extending upwardly from the base section 1 of the range at a slight rearward angle, then forwardly over the portion 58 thereof to a reversely bent horizontal upper edge section 59 approximately at the level of the forwardly projecting ledge formed by the members 41 and 42 at the bottom of the oven front frame. As will be evident from FIG. 2, section 59 of this piece is spaced from such inner ledge and forms therewith an elongated port 60 over the width of the oven, whereby air can flow upwardly through the lower portion of the oven section, through the lower forward flue which is in effect thus defined by the pieces 25 and 57, and then out this elongated port. It will be noted that the bottom edge of lower front piece 57, which spans the base section 1 is upwardly offset over its major extent as shown at 61 (FIG. 1), whereby there is an appreciable separation between the same and the top of the burner drawer 2 when the latter is closed.

The oven is provided with a door designated generally by reference numeral 62 of special construction, the same comprising separately formed inner and outer sections. Such outer door section comprises a relatively thin hollow rectangular frame 63 supporting therein a glass pane 64. This door section is pivoted at the left front of the oven frame to upper and lower tabs 66 and 67 which carry vertical pivot pins 68 and 69, the latter projecting into the door frame at the top and bottom left corners of the same and through reinforcements provided therein. A trim strip 70 extends around the outer edge of the door frame 63.

The inner door section comprises a similar hollow frame 71 and glass pane 72, and this section is independently hinged on the same pivot pins 68 and 69, the assembly being most readily apparent from the enlarged view in FIG. 7 of the top connection. It will here be seen that the inner door frame 71 carries a stud 73 projecting downwardly from the inside of the top of the frame, adjacent the left edge, and a general Z-shaped strap 74 pivoted on said stud extends forwardly through a slot in the front side of the frame and about the adjacent end with its outer end 75 offset upwardly and fixed on the pin 68 above the top of the outer door frame 63. This assembly is repeated at the bottom of the inner door frame 71 by the further stud 76 and link 77, cooperating with the bottom pin 69, and it will thus be seen that the two door sections are independently hinged and normally in laterally spaced apart relation.

A handle 80 is provided at the right side of the outer door frame, and in order that the two door sections may move in unison, they are provided along their vertical portions at the right respectively with overlapping flanges 81 and 82. As shown in FIGS. 8 and 9, the door frames 63 and 71 are held together by means of a U-shaped fastener 83 the legs of which extend through corresponding holes formed in the overlapped flange sections be-

tween the two door sections and approximately midway of the height thereof. This fastener will normally be in place as shown, and fitted snugly through the registered holes. By removing the fastener, however, it is possible to separate the door sections, as illustrated in FIG. 10, so that the inner surfaces of the two panes are exposed for easy cleaning.

Moreover, it will be seen that the space between the two door sections is approximately in register with the port 60 in the horizontal projection across the bottom of the oven frame through which air proceeds from the interior of the oven section 3, and there is consequently a flow of warmed air upwardly through the door effective to reduce the tendency for condensation on the inner surfaces. It will be noted in FIG. 10 that the front frame 63 has a left side flange 84 which overlaps the rear frame 71 whereby the vertical sides of the door assembly are closed and all flow of air therethrough discharges at the top.

With regard now to the details of the burner drawer 2, the same comprises side walls 85 and 86 (FIG. 3) carrying rollers 87 and 88 which ride in channels 89 and 90 secured to the inner side walls 91 and 92 of the base section 1. The drawer is closed at the front by a panel 93 (FIG. 4) and has a bottom 94 in which a fairly large opening 95 is provided. A channel brace 96 bridges the tops of the side walls 85 and 86 toward the rear of the same, and two spacer channels 97 and 98 are secured to the bottom of the drawer extending thereacross, with one in front of the opening 95 and the other to the rear of the same. With particular reference to FIG. 4, a first gas burner 99 has its head mounting flange 100 removably secured to the front spacer 97 in the left front corner of the drawer, this burner having a long Venturi tube 101 extending to the rear and releasably supported in a spring bracket 102 attached to the rear transverse spacer 98. To the right and inwardly with respect to such first burner 99, there is a second burner 103 of similar construction having its mounting flange 104 secured to the rear bottom spacer 98 and its venturi 105 releasably held in a downwardly open spring bracket 106 secured to the underside of the rear transverse brace 96 of the drawer. A third burner 107 is mounted similarly as such second burner, at the other side of the center of the drawer, and a fourth burner 108 is located and mounted correspondingly as the first burner in the front right corner of the drawer, the arrangement being symmertical about the longitudinal (fore and aft) centerline of the drawer.

A gas supply manifold 109 extends along the back of the base section of the range, such manifold being positioned between the sides of the drawer at an elevation for passage therebeneath of the inner ends of the rear burners 103 and 107 when the drawer is closed to the position illustrated in FIG. 2. This manifold receives gas from a tube 110 leading to the external gas connection of the range, not shown, through a control valve 111 supported centrally on the bottom 112 of the base section 1, with a tube 113 connecting the supply side of such valve to the manifold at the point 114. Adjacent the left end of the manifold, there is a take-off 115 therefrom to a conventional rotary flow-regulating valve 116 for supply of the gas from the manifold through a hairpin tube 117 which extends slidably through a sleeve 118, preferably made of nylon, in the ported end 119 of the venturi of the first burner 99. In lieu of the usual operating handle, the valve has a long tube 120 secured to its stem and extending forwardly approximately to the front of the side walls of the base section. At such end, the tube 120 is fitted with a square socket 121, preferably made of nylon, and telescoped therein is a square shaft 122 continuing forward to a suitable knob 123 mounted on the front 93 of the drawer.

Gas is supplied to the second burner 103 in the same manner, through a tap or take-off 124 connected to the manifold 109, a similar flow-regulating valve 125, and a hairpin supply tube 126 to the burner venturi, with this valve actuated by a like rotary tube 127, telescoped square shaft 128, and front control knob 129. The flow control assembly for the third burner 107 is the same as that for the second burner, while the supply to the fourth burner 108 is accomplished correspondingly as the first burner, so that further detailed description thereof is not necessary. It will be apparent that the several square control shafts or rods for rotary control of the burner valves telescope within their respective tubes when the drawer is moved inwardly from the open position shown in FIG. 4, and that the spuds or gas supply tubes for the burners enter the venturis of the same, such venturi sections being thus considerably elongated to accommodate the penetration of the tubes, as illustrated in FIG. 2.

Each pair of burners to one side of center is served by a common pilot line, the two such lines being indicated at 130 and 131 and extending from the gas supply line 110 ahead of the control valve 111. The pilot line 130 thus extends forwardly to the region of the rear bottom spacer 98 (without fastening thereto) and, when the drawer is in its full open condition shown in FIG. 4, a flame tube 132 mounted on a drawer bracket 133 is positioned with its supply opening 134 over the end of the tube 130 and hence the pilot flame. This tube 132 provides ignition of both first and second burners 99 and 103, and it will be understood that the pilot arrangement for the third and fourth burners is a mirror assembly. The two flame tubes of course move with the drawer, while the pilot lines are stationary and hence of a length to accommodate the inward movement of the drawer to the closed position.

Flanges extending along and slightly offset downwardly from the top edges of the drawer sides 85 and 86, the drawer front 93, and the rear brace 96, together form a peripheral seat for a removable cover plate 135 for the drawer having openings at the burner areas. A drip pan 136 is suspended in each such opening and removable grates 137 are positioned therein for support of pans and the like over the burners in the usual manner. It will now be seen that the relief 61 in the lower front edge of the vertical wall 25 of the oven section 3, at the front, accommodates passage of the grates, as indicated in FIG. 3.

With further regard now to the structure and operation of the control valve 111 as shown in FIGS. 5 and 6, it is the function of this valve in the main supply line 110 to the manifold 109, and hence the several burners of the drawer, automatically to cut off the supply upon movement of the drawer from its full open position and, of course, to maintain such interruption of the flow regardless of the condition of the individual rotary controls for the burners in all but the full open drawer position. Such valve comprises a housing 138 with a supply port 139 at one end connected to the gas line 110 and a discharge port 140 at its other end connected to the extension of such line 113 to the manifold 109. Between such ports and their respective internally connected passages 141 and 142, there is a chamber 143 having a circular seat 144 in a wall 145 defining its bottom, the supply passage leading to such chamber and the opening defined by the seat communicating with the discharge passage. A projection 146 from the bottom wall of the housing centrally of the seat reciprocably supports a vertical valve rod 147 therein. This rod has fixed thereto a valve disc 148 of relatively soft material adapted to bear against the upper edge of the valve seat 144, which is pointed as shown, thereby to close the valve. Retainer discs 149 and 150 are provided at both sides of the valve disc, and the normally open top of the chamber 143 is closed by a cap 151, such cap being tightly secured in place by means of a ring 152 overlying the periphery of the same and fastened to the housing by a plurality of screws 153, with a cap gasket 154 interposed between the contact surfaces of the cap and housing. A valve lifter disc 155 is secured to the

valve rod 147 at the upper end of the same, with a disc cushion 156 of resilient material overlying the upper face of the lifter disc, and a return spring 157 is positioned between the cap and the upper retainer 149 of the valve disc.

The lifter disc 155 of the valve is made of magnetically permeable material, and the desired automatic control is accomplished by means of a permanent magnet 158 carried at the free end of a bowed arm 159 attached to the rear of the cross brace 96 of the drawer 2. As shown in FIGS. 4 and 5, when the drawer is fully opened, the magnet 158 is positioned on the cap 151 of the valve, and through magnetic attraction, raises the lifter disc 155 to lift the valve disc 148 from the seat 144 thereby to permit flow of gas through the valve. When the drawer is pushed inwardly from such position, the magnet is moved away from the valve, whereupon the spring 157 operates to close the valve by forcing the disc 148 down against the seat 144, this being the normal valve condition. By virtue of the cantilever and bowed arm support for the magnet 158, spring action is provided therein and the magnetic actuator snaps from the valve when the spring tension in the arm overcomes the magnetic attraction, whereby the cutoff is very clean and quick. For example, less than one-fourth inch travel of the pilot lines with respect to the operative positions of their associated flare tubes is accompanied by closure of the valve. It will be understood that the supply of gas to the oven is independent of such valve and controlled in the usual manner.

The opening 95 in the bottom of the drawer admits secondary air for the surface burners and also for the oven section when the drawer is open, this being the only condition in which the surface burners can be operative. When the drawer is closed, on the other hand, air is admitted to the oven through the clearance provided between the drawer top and the lower front edge 61 of the oven section and partially through the exposed surface burner openings. The venting of the oven and the circulation of air through the door of the same have already been discussed, but with reference to FIG. 3, it will also be seen that air proceeds by convection when the oven is operative upwardly along the left side of the oven section 3 through the space defined by the outer and inner walls 5 and 12 at such side. This air passes into the space at the top between the outer top 10 of the casing and the inner top 20, and air from the lower portion of the oven section will also flow upwardly to this last space through the chamber 19 in which the oven controls are located. Air thus collected within the top flows forwardly and is discharged through the perforated strip 45, the arrows in the several figures showing such convection currents. Air may also flow upwardly through the rear double wall for exhaust in the same manner. This circulation of air is beneficial in dissipating heat about the periphery of the oven section 3, and it has been found that the flow through the control chamber 19 is particularly advantageous by reason of its cooling effect on the components mounted therein. The peripheral cooling enhances enclosure of the range with cabinet structure, generally made of wood, while the reduction in the temperature to which the oven controls are heated is sufficient to keep the manual elements thereof from becoming uncomfortably hot to the touch. Such cooling of the controls, moreover, benefits operation and the service life of the same.

As indicated at the outset, this range can be mounted by a base cabinet of any appropriate design, with the mounting placing the burner drawer approximately at waist height and the oven consequently generally at eye level. In FIG. 2, there is shown a hanger for suspension of the range on the kitchen wall, the back of the oven section near the top being provided with a recess 160 in which a vertical pin 161 securely fastened interiorly at the rear of range projects at its lower end. A complemental bracket 162 is suitably fastened to the kitchen wall and has an apertured flange 163 which projects into the recess to support the range at the shoulder provided by the top thereof, as illustrated, with the pin 161 passed through the bracket aperture to lock the range in place. At least one other such hanger mounting will of course be provided, and preferably a sealing strip 164 is disposed between the wall and the range above the line of the brackets.

It will accordingly be seen that the new gas range provides a unitary combination of surface burners and oven which is extremely flexible with regard to installation and, in all forms of mounting, highly convenient to operate. The provision of a sliding burner drawer offers, in the combination, a full size cooking top in compact structure, and the magnetic safety valve described of course absolutely prevents combustion at any burner in the top when in any position other than its fully extended position. Workers in the art particularly will appreciate that this disclosure is of one complete model of gas range and that other specific combinations of the various improvements which have been incorporated therein can be used as well to provide other models, for example, a range of larger size and having two ovens side-by-side. Such a modification could, within the teachings hereof, be the same as to certain features, such as the convection system described, and duplicative as to other features, for example, the oven door assembly shown, and yet could utilize a different surface burner arrangement. Similarly, the burner drawer set forth may be found useful in different environments wherein its characteristics would afford the same or similar advantages.

Other modes of applying the principle of the invention may be employed, change being made as regards the details described, provided the features stated in any of the following claims or the equivalent of such be employed.

We, therefore, particularly point out and distinctly claim as our invention:

1. In a gas cooking top assembly, support means mounted for sliding movement between a first position and a relatively extended second position, a gas burner carried by said support means to move therewith, said burner having a long intake section which extends in the direction of such movement thereof, a flame tube for said burner adjacent and fixed relative thereto on the support means, a stationary gas supply tube substantially aligned with the burner intake section and slidably passing through the outer end of the same, and a stationary pilot line, the supply tube extending appreciably into the burner intake section and the pilot line beyond the flame tube when the support means is in its said first position, movement of the support means to its second position withdrawing the burner to locate the supply tube end adjacent the end of the intake section thereof and positioning the flame tube at the end of the pilot line.

2. In a gas cooking top assembly, support means mounted for sliding movement between a first position and a relatively extended second position, a gas burner carried by said support means to move therewith, said burner having a long intake section which extends in the direction of such movement thereof, a flame tube for said burner adjacent and fixed relative thereto on the support means, a stationary gas supply tube substantially aligned with the burner intake section and slidably passing through the outer end of the same, a stationary pilot line, the supply tube extending appreciably into the burner intake section and the pilot line beyond the flame tube when the support means is in its said first position, movement of the support means to its second position withdrawing the burner to locate the supply tube end adjacent the end of the intake section thereof and positioning the flame tube at the end of the pilot line, valve means operative to control the flow of gas through the gas supply tube, and means for actuating said valve means responsive to positioning of the support means to open the valve means only when the support means is in or substantially

in its relatively extended second position, the supply of gas through the pilot line being unaffected by such operation of said valve means.

3. In a gas cooking top, a gas burner, a carriage on which said burner is mounted and moved thereby between storage and working positions, conduit means for supplying gas to the burner, normally closed stationary magnetic valve means in said conduit means to control the flow of gas therethrough to the burner, an actuator magnet for said valve means, and a resilient mounting for the magnet attached to said carriage to move relative to the valve means, said mounting locating the magnet adjacent the valve means when the burner is in its working position to open the valve means, and the mounting being stressed to overcome the magnetic attraction between the magnet and valve means when the magnet is moved away for abrupt separation from the valve means.

4. A gas cooking top comprising an enclosure, a drawer having a cover plate and being slidably supported in said enclosure between relative inner and outer positions, a gas burner mounted in said drawer at an opening provided therefor in the cover plate of the latter, means for supplying gas to said burner including a manifold in the enclosure and a tube leading therefrom to the burner, the manifold and tube being stationary and the tube telescoped within the burner, valve means connected to the manifold for regulating the flow of gas to the burner tube, telescopic actuator means for the valve means extending therefrom to the front of the drawer, and manual operating means at the drawer front connected to said actuator means for actuation of the valve means thereby.

5. A gas cooking top comprising an enclosure, a drawer having a cover plate and being slidably supported in said enclosure between relative inner and outer positions, a gas burner mounted in said drawer at an opening provided therefor in the cover plate of the latter, means for supplying gas to said burner including a manifold in the enclosure and a tube leading therefrom to the burner, the manifold and tube being stationary and the tube telescoped within the burner, valve means connected to the manifold for regulating the flow of gas to the burner tube, telescopic actuator means for the valve means extending therefrom to the front of the drawer, manual operating means at the drawer front connected to said actuator means for actuation of the valve means thereby and further valve means operative in response to movement of the drawer, said further valve means permitting gas to flow to the first-mentioned valve means only when the drawer is in its relative outer position.

6. In a gas range, enclosure means forming a relatively shallow base section and an upstanding oven section at the rear of said base section, a drawer slidably supported in said base section for extension at the front, a plurality of surface gas burners carried by said drawer for cooking thereon at the top of the same, at least one of said burners being obscured beneath the oven section when the drawer is closed and exposed upon opening thereof, stationary gas supply lines for said burners respectively telescoped therein, manual valves in said supply lines at the rear of the base section having telescopic actuators which extend to the front of the drawer, controls mounted at the drawer front and connected to said actuators, and safety valve means common to the several burner supply lines, said safety valve means being responsive to positioning of the drawer and operative to permit gas flow to the burners only when the drawer is substantially fully open irrespective of the settings of the manual valves.

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