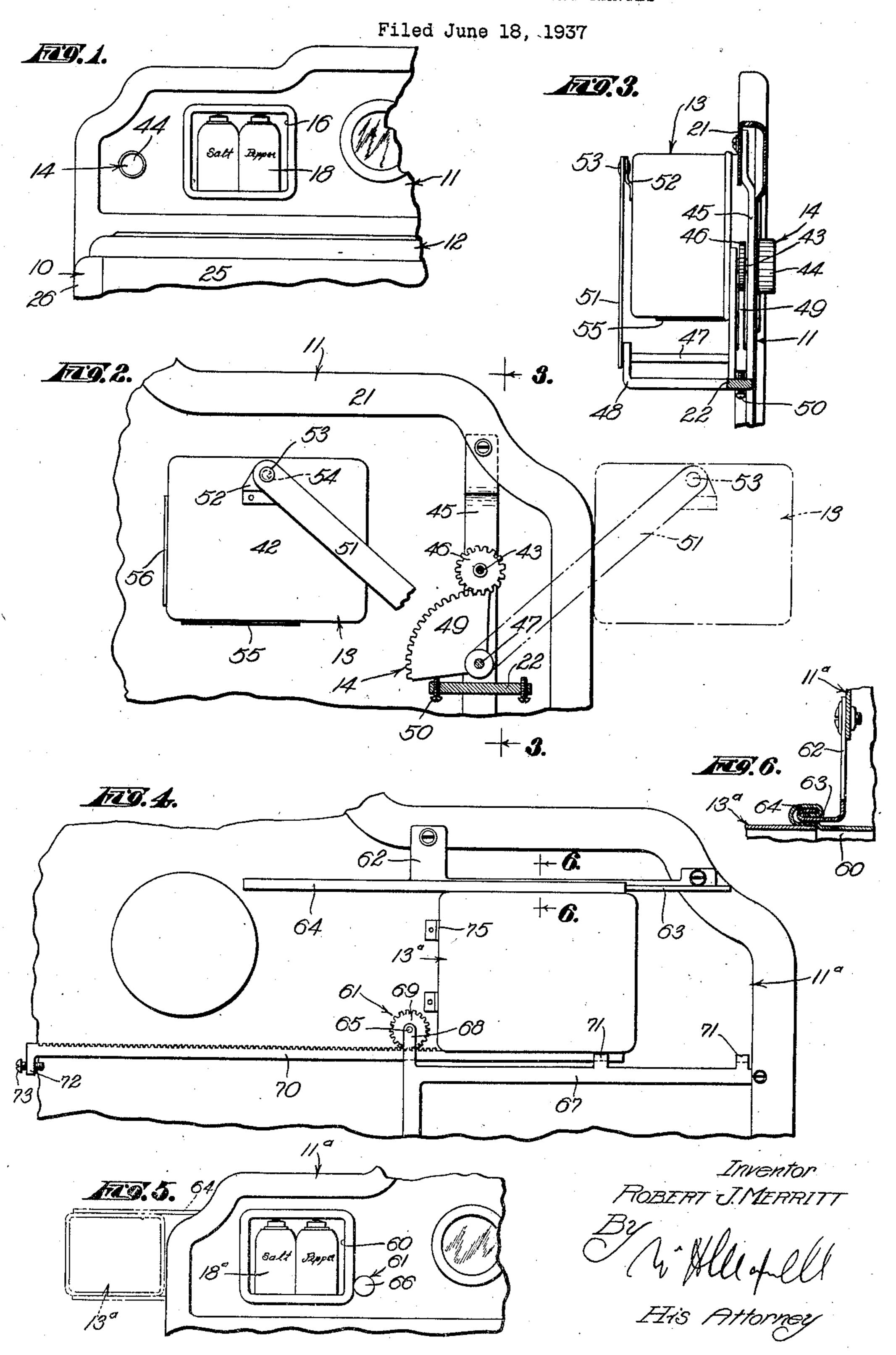
DEVICE FOR USE ON COOKING RANGES



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DEVICE FOR USE ON COOKING RANGES

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14 Claims. (Cl. 126-333)

This invention relates to cooking stoves or ranges and relates more particularly to ranges or stoves having condiment carrying devices.

Cooking ranges are often provided with tops or covers for covering the top burners and the plate warming top of the oven. These covers are usually hinged at their rear edges and when they are raised or opened they conceal the rear guard rail of the range. The rear guard rail of a range is a convenient place to position salt and pepper receptacles, etc. and the rail is often provided with pockets or similar means for such condiment receptacles. However, when the covers are raised they conceal the receptacles on the rear guard rail and make them practically inaccessible.

A general object of this invention is to provide an improved cooking range having a hinged cover and a condiment carrier normally positioned at the rear guard rail that may be easily operated to a position where it is conveniently accessible when the cover is to be brought to its raised or open position.

Another object of this invention is to provide a range construction embodying a rear guard rail, hinged covers and shiftable condiment carriers that may be quickly moved between positions at the rear guard rail and positions where they are conveniently accessible at the sides or ends of the range when the covers are to be raised to their open positions where they conceal the greater portion of the guard rail.

Another object of this invention is to provide a cooking range construction of the character mentioned in which the mechanisms for operating or shifting the condiment carriers are small and compact and are entirely concealed.

Another object of this invention is to provide a range construction of the character mentioned in which the condiment carriers may be easily and conveniently shifted to their out or accessible positions at the ends of the range after the range covers have been moved to their open or raised positions.

A further object of this invention is to provide a cooking range construction of the character mentioned in which the condiment carriers and their operating means may be easily and inexpensively embodied in the general range construction.

The various objects and features of my invention will be fully understood from the following detailed description of typical preferred forms and applications of the invention, throughout

which description reference is made to the accompanying drawing, in which:

Fig. 1 is a front elevation of a portion of a cooking range embodying one form of the invention. Fig. 2 is an enlarged fragmentary rear view 5 of the construction illustrated in Fig. 1 with broken lines illustrating the condiment carrier in its projected or extended position. Fig. 3 is a fragmentary vertical detailed sectional view taken substantially as indicated by line 3—3 on Fig. 2. 10 Fig. 4 is a fragmentary rear elevation view of a portion of a range embodying another form of the invention. Fig. 5 is a reduced fragmentary front elevation of the structure illustrated in Fig. 4 showing the extended position of the condiment 15 carrier in broken lines and Fig. 6 is an enlarged fragmentary vertical detailed sectional view taken as indicated by line 6—6 on Fig. 4.

This application relates to range devices or constructions of the general character described 20 and claimed in my co-pending application, Serial No. 148,872, filed June 18, 1937.

The present invention may be applied to or embodied in gas ranges and electric cooking ranges of various types and styles. In the following detailed description I will describe typical forms of the invention as embodied in a more or less conventional type of cooking range. It is to be understood that the invention is not to be construed as limited or restricted to the specific 30 forms or applications of the invention about to be described.

The cooking range construction of the present invention illustrated in Figs. 1, 2 and 3 of the drawing includes, generally, a range body 10 having a hinged cover 12, a rear guard rail 11 on the body 10, a condiment carrier 13 and means 14 for shifting the carrier 13 between a position where it is accessible at the face of the rail 11 and a position at an end of the range body 10 40 where it is accessible when the cover 12 is raised.

The range body 10 may be of any suitable or typical construction and the present invention is not primarily concerned with the details of the range body. For this reason I have illustrated 45 only a portion of the range body, which portion includes the front 25 and a side or end 26. The cover 12 is provided to extend over the top or a portion of the top of the range body 10. In practice there may be two covers 12, one for covering the top burners of the range and the other for covering the plate warming top of the oven. As the covers 12 are identical I have included only one of them in the present disclosure. The cover 12 has its rear edge hinged to the body 10 55

in the usual manner, to be swung between the closed position illustrated in the drawing, and a substantially vertical position where it projects upwardly adjacent the rear edge of the body 10.

The rear guard apron or rail !! extends along the rear edge portion of the body 10 and is upstanding or substantially vertical. While I have illustrated only one end portion of the rail 10 it is to be understood that the rail may extend along substantially the entire rear edge of the body 10 and that the portion of the rail omitted from the drawing may be complementary to that shown. The rail !! has an opening !6 spaced inwardly some distance from its adjacent end. There may be an opening similar to the opening 16 in the rail !! adjacent its other end. The particular opening 16 illustrated in the drawing is rectangular and is provided to render the condiment carrier 13 accessible when it is in its nor-20 mal position, as will be subsequently described.

The condiment carrier 13 is normally positioned at the rear of the rail | | to be accessible through the opening 15 and is swingable or shiftable outwardly to a position beyond the adjacent end of 25 the rail when the cover 12 is to be raised so that it may be readily accessible when the cover is in its up or vertical position. The carrier 13 may be a generally rectangular member formed of sheet metal or the like. The carrier 13 may have 30 a closed back 42, closed sides and closed top and bottom walls. The front or forward side of the condiment carrier 13 is open to receive condiment receptacles 18. The open front of the carrier 13 may be of sufficient size to fully register with the opening 16 when the carrier is in its normal position.

The means 14 for supporting and for shifting the carrier 13 includes a substantially horizontal shaft 43 extending through an opening in the 40 apron or rail 11. The shaft 43 may be spaced between the opening 16 and the adjacent end of the rail !!. A suitable knob 44 is fixed to the outer end of the shaft 43 to facilitate the manual turning of the shaft. It is to be noted that the knob 44 is located adjacent the end of the rail 11, to be accessible for manipulation when the adjacent range cover 12 is in its raised position. The user may introduce his hand or fingers between the raised cover 12 and the rail 11 to en-50 gage and manipulate the knob 44 adjacent the end of the rail. The shaft 43 may be rotatably carried by a suitable bracket 45 on the rear side of the rail !!. The bracket 45 may be attached to the edge flange 21 of the rail 11 and to a suitable part (not shown) of the range body 10. A pinion 46 is fixed to the inner or rear portion of the shaft 43. A second shaft 47 is rotatably supported by the bracket 45 in spaced relation to the shaft 43. The shaft 47 projects some distance rearwardly from the bracket 45 and its outer portion may be rotatably supported by an arm 48 on the bracket. A segment gear 49 is fixed to the shaft 47 and meshes with the pinion 46. The bracket 45 has a transverse bar 22. Spaced adjustable screws 50 are carried by the bracket bar 22 and are engageable by the ends of the segment gear 49 to limit turning of the shaft 47 and to prevent disengagement of the gear from the pinion 46.

The means 14 includes an operative connection between the shaft 47 and the condiment carrier 13 whereby the carrier is supported on the shaft and is movable by the shaft. This connection comprises a lever arm 5! fixed to the shaft 47 to be turned thereby. The condiment carrier

13 is pivotally connected with the arm 51 to be supported thereon. The point of pivotal connection between the arm 51 and the carrier 13 is preferably located above the center of gravity of the carrier 13 and substantially midway between 5 the opposite sides of the carrier. In the construction illustrated a bracket 52 is secured to the rear wall 42 of the carrier 13 adjacent its upper edge and substantially midway between its opposite sides. A pin 53 is carried by the bracket 10 52 and is pivotally received in an opening 54 in the arm 51. The ends of the pin 53 may be riveted over to prevent the disconnection of the carrier 13 from the arm 51. When the knob 44 is turned to swing the arm 51 the carrier 13 of course 15 moves with the arm and pivots about the axis of the pin 53 to remain in its upright position where its upper and lower walls are substantially horizontal. Thus when the arm 5! is moved to the position illustrated by the broken lines in Fig. 2 20 the top and bottom walls of the carrier 13 remain substantially horizontally throughout the swinging movement of the arm.

It is preferred to provide means at the opening 16 to definitely locate and stop the carrier 13 25 when the carrier is returned to its normal position. A flange 55 extends rearwardly from the rail 11 at the lower edge of the opening 16 and a similar flange 55 projects rearwardly from the rail at the side edge of the opening 16 most re- 30 mote from the adjacent end of the rail 11. The flanges 55 and 56 are engaged by the bottom and an end respectively of the carrier 13 to definitely locate the carrier 13 and to prevent pivoting of the carrier when the same is at the opening 18. 35

It is believed that the operation of the construction illustrated in Figs. 1, 2 and 3 will be understood from the foregoing detailed description. The condiment carrier 13 may normally be located at the rear of the opening 16 to have 40 its open front register with the opening so that the receptacles 18 are conveniently accessible. The flanges 55 and 56 serve to definitely prevent rocking or swinging of the carrier 13 when it is in this position. When the adjacent range cover 45 12 is to be raised the knob 44 may be turned to swing the lever 51 outwardly. The carrier 13 is of course moved with the arm 5! but independently pivots about the axis of the pin 53 to remain in the position where its upper and lower walls 50 are horizontal. The knob 44 may be turned until an edge of the segment gear 49 engages a screw 50 to stop further movement of the arm and carrier. This positions the carrier 13 as illustrated by the broken lines in Fig. 2. With the carrier 55 13 in this position the condiment receptacles 18 are conveniently accessible. Thus the cover 12 may be moved to its upright or vertical position without covering or concealing the condiment containers 18. As pointed out above, the knob 44 60 may be if necessary engaged when the cover 12 is in its vertical position so that the carrier 13 may be swung to its out position after the cover has been raised. In a like manner the knob 44 may be manipulated to return the carrier 13 to its position at the opening 16 at any time. It will be observed that the carrier 13 cannot at any time engage or interfere with the hinged cover 12. The carrier 13 is at all times at the rear of the apron or rail | and cannot be struck by the 70 cover 12.

Figs. 4, 5 and 6 of the drawing illustrate a form of the invention in which the condiment carrier 13a is shiftable or translatable. The construction illustrated in Figs. 4, 5 and 6 includes, 75

2,125,514

generally, a guard apron or rail 112 having an opening 60, a condiment carrier 132 shiftable between a position at the opening 60 and a position beyond an end of the rail 112, and means 61 for moving or shifting the carrier 132.

The guard apron or rail 11° projects upwardly at the rear edge of the range body and may be similar to the rail 11. The opening 60 may be rectangular and is preferably spaced inwardly from an end of the rail. It is to be understood, of course, that the rail 11° may have two similar

openings 60, one adjacent each end.

The condiment carrier 13a may be similar to the carrier 13 of the above described form of the invention. The carrier 13° may be substantially rectangular and formed of sheet metal, or the like. The carrier 13a has an open forward side and its back, ends, sides, top and bottom are closed. The open front or side of the carrier 13a is preferably sufficiently large to fully communicate with the opening 60 when the carrier is in its normal position at the opening. In accordance with this form of the invention the carrier 13a is supported for substantially horizontal movement at the rear of the rail 112. A bracket 62 is secured to the rear side of the rail 11a and has a horizontal track 63. The track 63 may be substantially U-shaped in cross section, as best illustrated in Fig. 6. A flange or 30 channel member 64 is secured to the top of the carrier 13a to shiftably cooperate with the track 63 for the purpose of supporting the carrier for horizontal movement along the track. The member 64 may be substantially U-shaped in transverse cross section and slidably hooks into or shiftably meshes with the U-shaped track 63 to prevent rearward, as well as downward, movement of the carrier 13a and yet allow movement of the carrier along the track. The member 64 is of sufficient length to have a substantial portion in cooperation with the track 63 when the carrier is in its extended position shown by the broken lines in Fig. 5.

The means 61 for moving the condiment carrier 13a is in the nature of a rack and pinion means. A shaft 65 extends through an opening in the rail 112 and a knob 66 is secured to its forward end to be accessible at the face of the rail. A bracket 67 is secured to the rear side of the rail la and has an upwardly facing fork or yoke 68 rotatably supporting the shaft 65. The means 6! further includes a pinion 69 fixed on the shaft 65 between the arms of the yoke 68. The pinion 69 is provided to mesh with the teeth 55 of a rack 70 on the condiment carrier 13a. The rack 70 may be rigidly secured to the bottom wall of the carrier 13a and projects some distance inwardly from the carrier relative to the adjacent end of the rail 11a. The bracket 67 may have a 60 plurality of spaced upwardly facing yokes 71 to act as guides for the rack 70. The rack 70 cooperating with the yokes 71 and the yoke 68 is retained in proper mesh with the pinion 69 and prevents rearward movement of the lower end of the condiment carrier 13a. A lug 72 on the rack 70 may carry an adjustable stop screw 73. The screw 73 may engage the bracket 67 to limit the outward movement of the rack 70 and the carrier 13a. When the carrier 13a is in its pro-70 jected position illustrated by the broken lines in Fig. 5 the rack 70 has its inner portion engaged and guided by the yokes 71 and 68. Stops 75 are provided on the rear surface of the rail 112 to stop the inward movement of the carrier 13a in 75 a position in registration with the opening 60.

In the use of operation of the construction illustrated in Figs. 4, 5 and 6 of the drawing the knob 66 may be turned to move the condiment carrier 13a to the extended position. This may be done before the adjacent range cover 12 is 5 raised. When the condiment carrier 13a is in the extended position shown by the broken lines in Fig. 5 the receptacles or containers 18a in the carrier are conveniently accessible for use. The carrier 13a at all times remains behind the rail 10 I a so that it does not interfere with the adjacent range cover 12 when the same is raised. The means 61 for operating the carrier 13a and the means for supporting the carrier 13a are entirely concealed at the rear of the rail 112. When 15 the carrier 13a is at the opening 60 the receptacles 18a are easily engaged and may be readily removed from the carrier through the opening

Having described only typical preferred forms 20 and applications of my invention, I do not wish to be limited or restricted to the specific details herein set forth, but wish to reserve to myself any variations or modifications that may appear to those skilled in the art or fall within the scope 25 of the following claims.

Having described my invention, I claim:

1. In a cooking range having a rear guard rail with an opening, a condiment carrier behind the rail, means supporting the carrier for movement 30 between a position where its contents are accessible through the opening and a position where its contents are accessible beyond a margin of the rail, and gear means for moving the carrier.

2. A cooking range including a body, a rear 35 guard rail on the body having an opening, a condiment carrier at the rear of the rail, means supporting the carrier for swinging movement, and means for swinging the carrier between a position where its contents are accessible through 40 the opening and a position beyond an edge of the rail to be readily accessible.

3. In a cooking range having a rear guard rail with an opening, the combination of, a condiment carrier at the rear of the rail, and means for mov-45 ing the carrier between a position where its contents are accessible through the opening and a position where it is accessible beyond an edge of the rail, said means including a gear element connected with the carrier, and a manually oper-50 able gear element cooperating with the first mentioned gear element.

4. In a cooking range having a rear guard rail with an opening, a condiment carrier at the rear of the rail, and means for swinging the carrier 55 about a substantially horizontal axis between a position where its contents are accessible through the opening and a position where its contents are accessible beyond a margin of the rail.

5. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a condiment carrier at the rear side of the rail, and gear means for moving the carrier from a position where it is accessible through the opening and a position where it is accessible 65 beyond an end of the rail.

6. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, a swingable arm carrying 70 the carrier, and means for swinging the arm to move the carrier between a position where it is accessible through the opening and a position beyond an end of the rail.

7. In a cooking range having a body, the com- 75

bination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, a swingable arm carrying the carrier, and gear means for swinging the arm to move the carrier between a position where it is accessible through the opening and a position beyond an end of the rail.

8. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, and rack and pinion means for shifting the carrier between a position where it is accessible through the opening and a position beyond an end of the rail.

9. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, a swingable arm carrying the carrier, stop means locating the carrier where it is accessible through the opening, and manually operable gear means for swinging the arm to move the carrier between the position at the opening and a position beyond an end of the rail.

bination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, a swingable arm carrying the carrier, gear mechanism behind the rail for swinging the arm to move the carrier between the position at the opening and a position beyond an end of the rail, and a manually operable part at the face of the rail for operating the gear mechanism.

11. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, track means supporting the carrier for movement between a position where

it is accessible through the opening and a position where it is accessible beyond an end of the rail, and manually operable means for shifting the carrier.

12. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, track means supporting the carrier for movement between a position where it is accessible through the opening and a position where it is accessible beyond an end of the rail, and manually operable means for shifting the carrier, the last mentioned means including a rack on the carrier, a rotatable shaft having a manual operating part at the front of the rail, 15 and a pinion on the shaft meshing with the rack.

13. In a cooking range having a body, the combination of, a guard rail on the body having an opening, a shiftable condiment carrier at the rear side of the rail, track means supporting the 20 carrier for movement between a position where it is accessible through the opening and a position where it is accessible beyond an end of the rail, and manually operable means for shifting the carrier, the last mentioned means including a rack on the carrier, a rotatable shaft on the rail, a handle on the shaft accessible from the front of the rail, a pinion on the shaft meshing with the rack, and stop means for stopping the carrier in the two said positions.

14. A construction for a cooking range comprising, a rail having an opening, a condiment carrier at the rear of the rail, and means supporting the carrier for movement between a position where it is accessible through the opening and a position where it is beyond an end of the rail.

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