



ROSS

PATENT SEARCHLIGHT ARC LAMP "C" TYPE



The OPTICAL WORKS · CLAPHAM COMMON · LONDON. SW 4

TELEPHONE
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MAC · 2472
ROSSECASTE

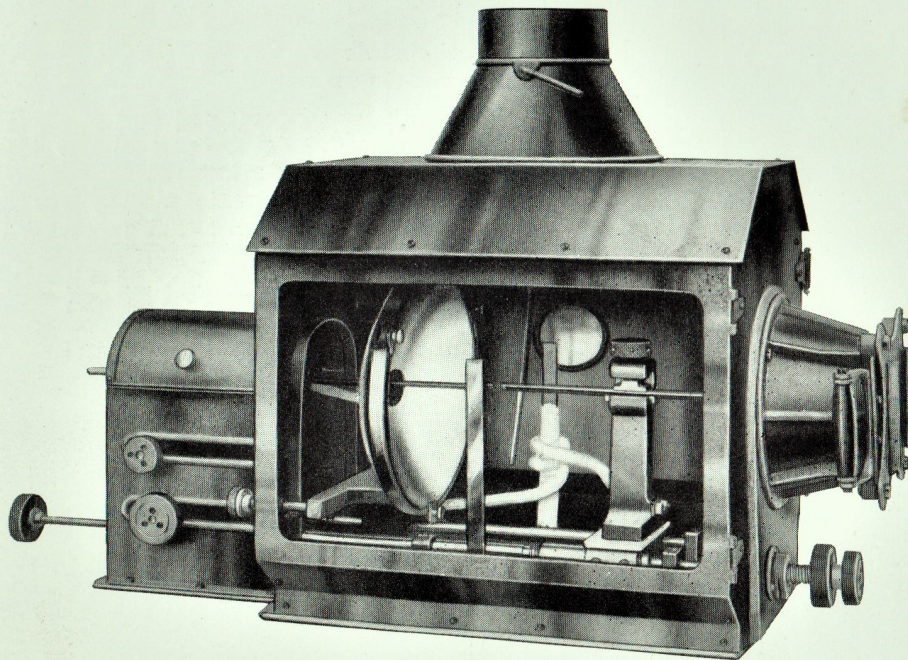
ROSS "C" TYPE SEARCHLIGHT ARC LAMP

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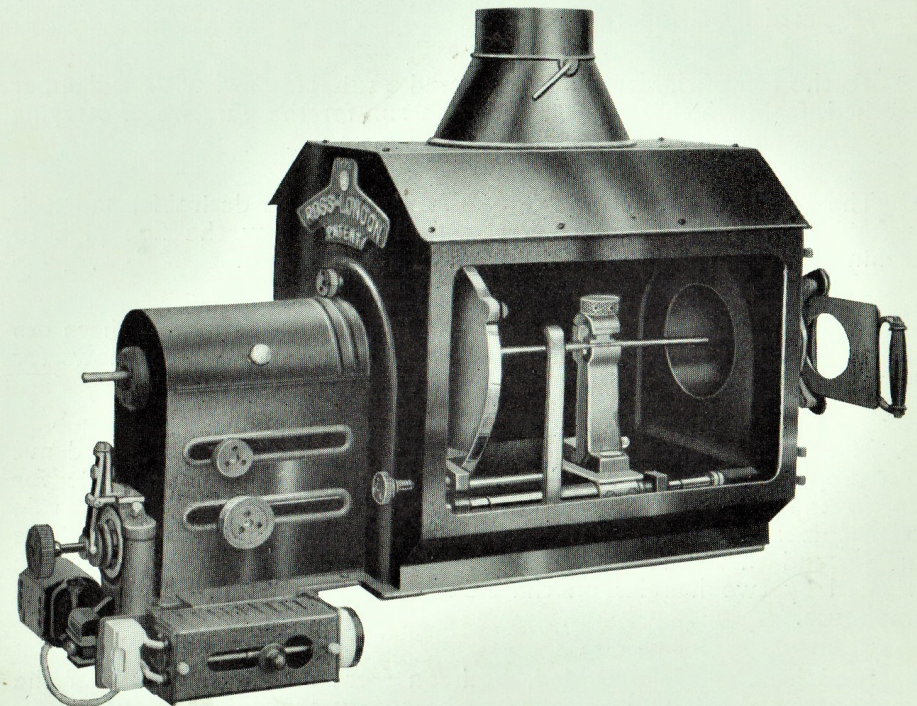
With 10in. ellipsoidal mirror and Magnetic Flame Control, in Lamphouse of sheet steel, blacked. Arc entirely enclosed and well ventilated, and with dowers.

Without Automatic Arc Control..... **£37**

With Automatic Control **£57**



Price without Automatic Control **£37**



Price with Automatic Control **£57**

The complete arc mechanism is moved forward or backwards for the purpose of focussing the light upon the gate by a handle located at the front of the lamphouse.

Should automatic feed be desired this can be fitted to the rear feed spindle at the back of the lamphouse. This constitutes an extra and is not fitted unless specially ordered. The automatic feed is of simple design and is a real benefit to the projectionist, especially under modern conditions, as it leaves his hands free and allows him to concentrate upon the picture and mechanism.

The spindle to which the automatic feed is attached is driven by a train of gears from a very small motor which obtains its current from the arc supply through a variable resistance which controls the motor speed and rate of feed to the carbons.

Once the rate of feed is adjusted by the resistance, and providing an arc gap of about $\frac{3}{8}$ in. is maintained, the arc will continue to burn steadily and without constant attention to the hand feed.

In order to adjust the arc gap by hand feed while the automatic feed is running, two small ratchet type gears are thrown out of mesh by a lever attached to the same, and when the lever is again released, the gears are thrown into mesh and held there by spring pressure.

Fibre terminal blocks are fitted to the arc lamp base in a position which allows the leads from the switchboard to be brought direct to the machine, and shorter asbestos covered flexible leads complete the run from the terminal block to the arc lamp terminals.

The motor leads are brought in a similar manner to the terminal block mentioned above.

Magnetic Flame Control is fitted, ensuring a perfectly steady light.

A special lever arm is also supplied to enable the operator to quickly adjust his carbons to their correct burning position.

The Arc burns at about 48-50 Arc Volts, and may be used with :—

Low Intensity Carbons to 40 amperes.

Hilo or similar type carbons to 60 amperes.

High Intensity Carbons using a coppered positive to 85 amperes.

The Ross "C" Type Lamphouse is constructed of sheet steel with double walls for the purpose of securing adequate and correct ventilation.

The doors which are the full width of the lamphouse allow of easy access for the purpose of carboning and cleaning, and are fitted with a round window of special glass through which a clean outline of the crater and negative carbon tip is seen while burning.

A 10in. ellipsoidal glass mirror specially backed to prevent damage to the silvering is held in a Gimbal housing enabling it to be swung in two directions at right angles to each other by means of two knobs situated in rear of the lamphouse.

A scientifically devised cone which effectively absorbs a great part of the heat from the rays directed upon the gate aperture is fitted to the front of the lamphouse.

A very substantial cut-off is provided to shut off all light from the film, and the ease and absolute certainty with which this operates will be welcomed by all operators.

To the top of the lamphouse is fitted a suitable cowl with a damper attached, from which a flue pipe may be run for the purpose of carrying away the carbon fumes from the operating room.

The fitting of a flue pipe has been found to be desirable, and it is preferable in cases where such is attached to allow the flue pipe to terminate above the cowl in the form of a bell-mouth.

Special holders are supplied for the negative carbons, and these can be readjusted as the carbon burns down in a manner which allows for the burning of the negative carbon to a very short length.

The carbon holder is attached by means of a clamp and milled nut to a supporting post in rear of the lamphouse, which is adjustable for moving the negative carbon up or down, or traversing it to either side so that it may be brought into perfect alignment with the positive carbon, and these movements are made by means of gears which are actuated by two handles on the side of the rear compartment of the lamphouse.

Feed handles are provided, both on front and at the back of the lamphouse, and this will be found to be a very convenient feature.