



SOUND AND PROJECTION

# EMI Pathe

50-54 Beak Street, London W1R 3DH Telephone 437 1544

Telex: 22760

A Division of

EMI Film & Theatre Corporation Ltd.

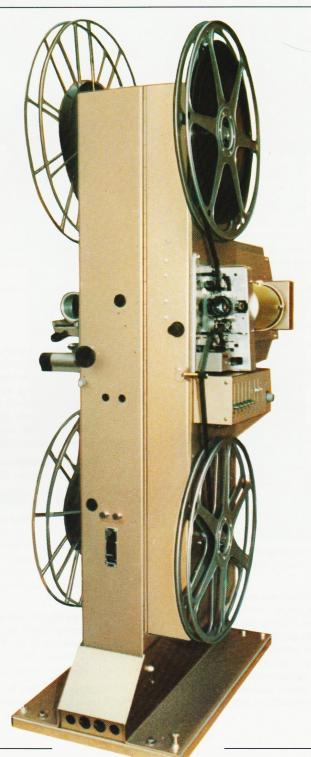
A Member of the EMI Group. International leaders in music, electronics and leisure.

Dual-Purpose Projector FP 28

The FP 28 Projector was developed for use in cinemas, studios and general purpose auditoria where excellent picture and sound quality are stipulated, using either 35 mm or 16 mm film.

In fact this projector combines the features of the famous FP 20 and FP 18 Projectors, the special characteristics of which are described in their respective brochures.

- Suitable for all 35 mm and 16 mm films
- Separate film paths
- Independent drive mechanisms
- No changing-over or readjustment of sprockets, guide rollers etc.
- Optimal light efficiency
- Remote control of all functions
- Simple operation
- High reliability
- Limited space requirement
- Straightforward installation
- Built-in sound equipment



#### Construction

The drive mechanism for 35 mm film is accommodated in a solid steel housing which it is possible to angle. The 16 mm mechanism is mounted in a recess in a hinged, specially strengthened door. Both film transport mechanisms, including the drive mechanisms, are independent of each other, ensuring high reliability. Moreover, this makes it unnecessary to exchange or re-adjust parts when changing-over from one gauge to the other.

A common electronic unit is shared by both projectors. It offers the capability for changing over from 16 mm to 35 mm projection and also to a second projector.

#### Installation

With its built-in preamplifier, output amplifier and its exciter lamp rectifier, the projector forms a completely wired unit. All functions, including volume control, can be operated from a remote control panel provided with a multi-pin plug. If desired, additional remote control panels can be similarly connected.

If halogen lamps are employed, all that is required to prepare the projector for operation is a single-phase mains connection and the loudspeaker cable, since the electrical unit is already equipped with all necessary fuses. Xenon lamps will require an additional rectifier.

## **Excellent Picture Quality**

The intermittent mechanisms specially designed for the two formats and their appropriately curved film gates, ensure excellent picture quality.

# **High Light Efficiency**

The optimal film advancement, together with the special shutters, guarantee a high light efficiency. For the 16 mm format this reaches the exceptionally high value of 72%.

# **Optimal Sound Quality**

The 35 mm and the 16 mm Projector have essentially the same optical scanning system. A rotating high precision sound drum guarantees the absence of 'wow' and 'flutter'.

The preamplifiers are accommodated below the 16 mm drive mechanisms. They are based on the Philips SQ 4 range and have 4 inputs with separate controls for levelling. They can be adapted for scanning optical, magnetic or non-sync sound tracks by insertion of the appropriate printed boards, which also allow connection of a second projector without an amplifier. The line



Centre part driving mechanism of 35 mm projector with sound head

amplifier has a maximum output level of 8 dBm. All preamplifiers have common treble and bass controls. The potentiometer for regulating auditorium volume is servo-motor controlled, so that it is possible to adjust it from any remote control panel without the losses normally incurred in conventional cable links.

The entirely transistorised power amplifier has an output power of 50 watts.

### Various Versions and Assemblies

Normally the 35 mm equipment is intended for scanning optical sound tracks and for spools up to 6000 feet of film, but it can be supplied fitted with  $\frac{1}{2}$ " shafts for spools containing up to 10,000 feet of film. It is possible to incorporate a four-track magnetic sound head.

The 16 mm equipment is normally supplied for scanning both optical and magnetic sound tracks and for film spools suitable for 5000 foot of film. On request, a perfoband machine can be built in.

Both projectors can be equipped to order for focusing and framing by remote control

Moreover, the 35 mm projector can be equipped with a servo-driven lens turret and a solenoid for mask changing by remote control. If sensors are used, automatic operation can be achieved by means of an automatic programmer.

Incorporation of a forward/reverse facility permits the film to travel in either direction.

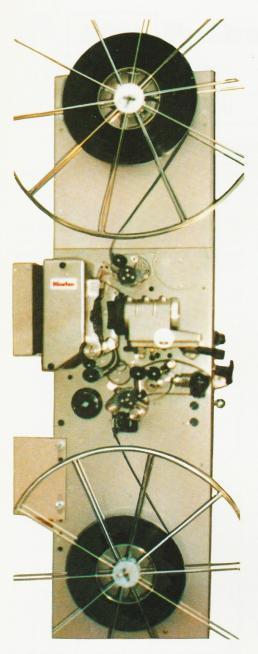
### **Light Sources**

The projector can be equipped with the following light sources:

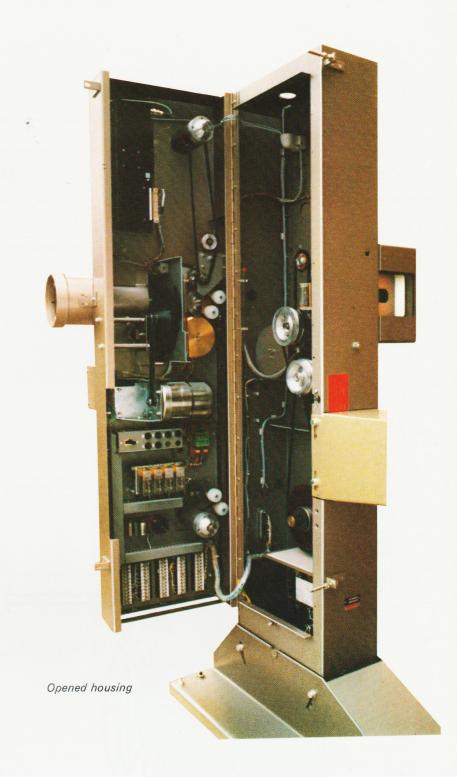
The 35 mm unit with a 36 volt 400 watt halogen lamp, the 16 mm unit with a 24 volt, 250 watt halogen lamp. Both units can be provided with a 500 watt or with a 700 to 1600 watt Xenon lamphouse.

If provided with a lamp house bracket, a common 700 to 1600 watt lamphouse with deflecting mirror can be used.

The sales and service agencies of Philips and Kinoton in more than 50 countries all over the world will be glad to advise you on the most appropriate combination for your purpose and to quote the relavant prices.



35 mm unit FP 28



Weights and measures		FP 28
Projector without lamphouse bracket	W	
lamphouse and amplifier		172,0 kg
Lamphouse bracket		18,5 kg
Xenon lamphouse 700/1600 W with		
mirror attachment		43,0 kg
Amplifier		3,5 kg

