

X100 Examination Light

The **DARAY**® X100 examination light is the perfect choice for value and performance.

LEDs (light emitting diodes) have been around for a long time. Recently this technology has become leading-edge in the field of lighting - a breakthrough technological solution to the inherent problems of the incandescent light bulb.

We have taken the technology and developed it further to provide high definition lighting solutions with no infrared, high brightness, low environmental impact, low power consumption, no toxic chemicals and a long operating life.

- Infection controlling design
- Low total cost of ownership
- 14,000 lux intensity \pm 500 @ 0.5m
- 3,500 lux intensity \pm 500 @ 1.0m
- 4,000K colour temperature
- Flexible arm and solid positioning
- Wall, desk, mobile and rail mount options available

Products Available

X100LW	X100 LED wall mount examination light
X100LR	X100 LED rail clamp examination light
X100LD	X100 LED desk mount examination light
X100LDS	X100 LED desk stand examination light
X100LM	X100 LED mobile examination light
XRAIL	Medical rail 1m length with fixings

Specifications

Light Source	LED (7W)
Light Intensity @ 0.5m	14,000 lux \pm 500
Light Intensity @ 1.0m	3,500 lux \pm 500
Colour Temperature	4,000K
Supply Voltage	12V 50Hz plug-top PSU
Arm Length	1000mm



X100LM



X100LD
Desk Clamp



X100LR
Rail Mounted
(XRAIL sold separately)



X100LW
Wall Mounted

All versions of the X100 LED are supplied with a plug-top power supply and the mount of your choice

X200 Range

Examination lighting

The **DARAY**® X200 range of examination lights have been designed specifically for use during medical consultation and diagnosis.

Utilising LED technology, this general examination light has been developed to provide an intense beam with excellent colour rendering properties.

The X200 series has a low 'total cost of ownership', costing up to 75% less to run than equivalent halogen lights. This light has around 50,000 hours of life from the LED light engine equating to around 25 years of clinical use. The X200 series requires minimal maintenance and has a smooth, fully enclosed BioProtect® head to assist with the management of infection control. This is an ideal light for GP surgeries and clinics where flexibility and performance are crucial.

Choose between a flexible gooseneck or a spring balanced arm and many different mounting options dependant on your application, including: wall, mobile, ceiling, and bed panel mount.



BioProtect® is an antimicrobial solution coating applied to DARAY's products for infection control. Our core products are medical, dental and veterinary lighting used by specialist staff treating patients.

Infection is the highest risk in patient environments. BioProtect® provides excellent protection against illness-causing bacteria such as MRSA, Salmonella, E. coli, Campylobacter and many other bacteria and fungal growths.

Features

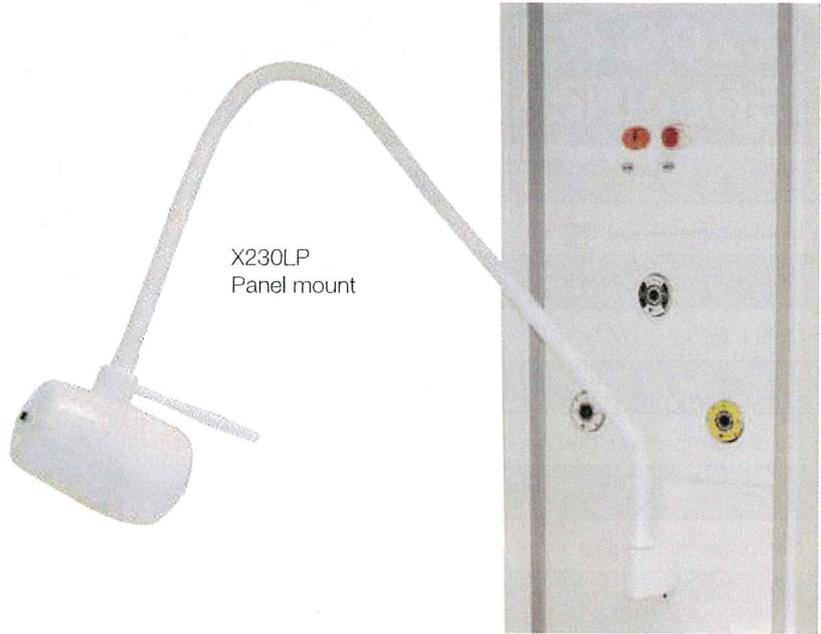
- Variable intensity from 0% to 100%.
- Smooth, fully enclosed head to prevent dust ingress.
- Excellent colour rendering - totally natural skin tones.
- Emits no infrared radiation - no increase in temperature in the light-field.
- A strong beam of light with an even intensity across the entire area for clearer viewing and reduced eye strain.
- No life-risk voltage at the light-head.
- BioProtect® anti-microbial coating for infection control - reduces the population of bacteria such as MRSA and E.Coli by between 99.99% and 99.9999% within 24 hours.
- Optional 3-4 hour battery back-up available

Our most versatile examination light, available in a range of mounting and arm options





X240LD
Desk mount



X230LP
Panel mount

Superb LED output



3-LED Module
offering 32,000
Lux @ 0.5m



X210LW
IEC wall mount



X200LM
Mobile base

Single-handed control



Power and light
intensity control
on rear of head



X200LD/X240LD
Desk Clamp



X200LDS/X240LDS
Weighted Desk Stand



X200LM
Mobile Base



X240LM
Weighted Mobile Base

X200 Range Specifications

Light Source	LED
Light Intensity (Lux) @ 0.5m	32,000 Lux \pm 5%
Light Intensity (Lux) @ 0.75m	14,000 Lux \pm 5%
Light Intensity (Lux) @ 1.0m	8,000 Lux \pm 5%
Light Intensity Adjustment Range	10 - 100%
Colour Temperature (Kelvin)	4,300K \pm 500
Colour Rendering Index (CRI)	95
Colour Rendering (R9)	88
Light Field Diameter (D50)	@ 0.5m: 120mm
	@ 0.75m: 135mm
	@ 1.0m: 180mm
Light Field Diameter (D10)	@ 0.5m: 230mm
	@ 0.75m: 325mm
	@ 1.0m: 460mm
Number of LED's	3
Power Consumption	12W 0.1A
Average Working Life	>50,000 Hours
Input Supply Rating	100 - 240V AC 50/60Hz
Output Supply Rating	12V DC 1A
Temperature Rise on Patient/User	\leq 2°C
Warranty Period	5 Years
NHS E-Class Code	FBU, FKR
Commodity Code	9018 908400
GMDN Code	12276



The above specifications apply to all models within the X200 Range.

Our 5-Year Warranty enables peace of mind from a name you can trust

X200 Flexible arm

The X200 LED model is the core product within the X200 Series.

This version features our classic flexible gooseneck that enables you to bring the light head to exactly where you need it. The X200 can be supplied with a range of mounting options, all of which are interchangeable.

All versions listed below are supplied with a plug-top power supply as standard.



Products Available

X200LW	DARAY X200 LED wall mounted examination light
X200LR	DARAY X200 LED rail mounted examination light
X200LD	DARAY X200 LED desk clamp examination light
X200LFDM	DARAY X200 LED fixed desk mount mount examination light
X200LM	DARAY X200 LED mobile examination light
XRAIL	1m Medical Rail for mounting X200LR (includes wall fixings)
XBB24LEDCW	24V battery backup power system (Special order)

CIBSE

LIG054
LIG058
LIG910
LIG9004

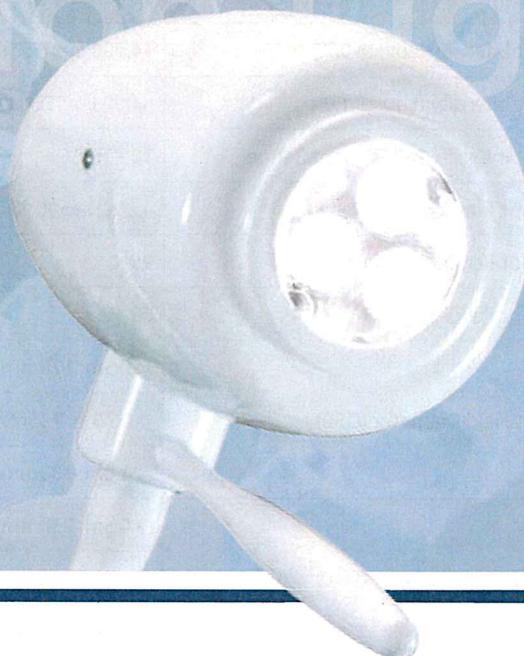
DARAY[®]
Medical

Product Datasheet

Examination Light

X240

LED



Introduction

The X240 LED Examination Light is designed specifically for use during medical consultation and diagnosis. Utilising LED technology, this general examination light has been developed to provide an intense beam with excellent colour rendering properties.

The X240 LED forms part of the **X200 LED Range**, which comprises the following models: X200, X210, X230, X240.

All models in the X200 LED Range offer identical light output, though with differing mounting/wiring options:

X200 - Same as X240, though with a flexible 'gooseneck' instead of the articulated (spring-balanced) arm.

X210 - Available as a wall/rail mount solution with an integrated transformer, to be hardwired.

X230 - Provides a panel mount bracket and an angled neck for mounting to bed-head trunking, to be hardwired.

X240 - Same as X200, though with an articulated (spring-balanced) arm instead of the flexible 'gooseneck'.

Datasheets are available for each model in this Range.

Standard Features

- World-renowned LED technology
- Variable intensity
- Spring-balanced arms for versatile movement and solid positioning
- Excellent colour rendering - for totally natural skin tones
- BioProtect® anti-microbial coating to assist in infection control
- Fully positionable light head
- Various mounting options available
- Energy-efficient, environmentally friendly, and a fully recyclable product

Available Options

X240LW	DARAY X240 LED wall mounted examination light
X240LR	DARAY X240 LED rail mounted examination light (rail sold separately - see XRAIL below)
X240LD	DARAY X240 LED desk clamp examination light
X240LDS	DARAY X240 LED desk stand examination light
X240LFDM	DARAY X240 LED fixed desk mount examination light
X240LM	DARAY X240 LED mobile examination light
X240LE1	DARAY X240 LED hardwired BESA wall mount examination light (special order)
X240LE2	DARAY X240 LED hardwired wall mount examination light (special order) - with separate transformer
X240LE3	DARAY X240 LED hardwired panel mount examination light (special order) - with separate transformer
X240LE4	DARAY X240 LED hardwired wall mount examination light (special order) - with integral transformer
XRAIL	1m Medical Rail for mounting X240LR (includes wall fixings)
XBB12	Battery back-up options available, please call

Bespoke solutions available, please call

Technical Specifications

Light Source	LED
Light Intensity (Lux) @ 0.5m	32,000 Lux \pm 5%
Light Intensity (Lux) @ 0.75m	14,000 Lux \pm 5%
Light Intensity (Lux) @ 1.0m	8,000 Lux \pm 5%
Light Intensity Adjustment Range	10 - 100%
Colour Temperature (Kelvin)	4,300K \pm 500
Colour Rendering Index (CRI)	95
Colour Rendering (R9)	88
Light Field Diameter (D50)	@ 0.5m: 120mm
	@ 0.75m: 135mm
	@ 1.0m: 180mm
Light Field Diameter (D10)	@ 0.5m: 230mm
	@ 0.75m: 325mm
	@ 1.0m: 460mm
Number of LED's	3
Power Consumption	12W 0.1A
Average Working Life	>50,000 Hours
Input Supply Rating	100 - 240V AC 50/60 Hz
Output Supply Rating	12V DC 1A
Temperature Rise on Patient/User	\leq 2°C
Warranty Period	5 Years
NHS E-Class Code	FBU, FKR
Commodity Code	9018 908400
GMDN Code	12276

Notes

The X240 has a low 'total cost of ownership', costing up to 75% less to run than equivalent halogen lights. This light has around 50,000 hours of life from the LED light engine equating to around 25 years of clinical use (based on 5.5 hours clinical use per day).

This model requires minimal maintenance and has a smooth, fully enclosed BioProtect® head to assist with the management of infection control. This is an ideal light for GP surgeries and clinics where flexibility and performance are crucial. Choose between many different mounting types dependant on your application, including: wall, mobile, and desk mounting options. Hardwired options also available.

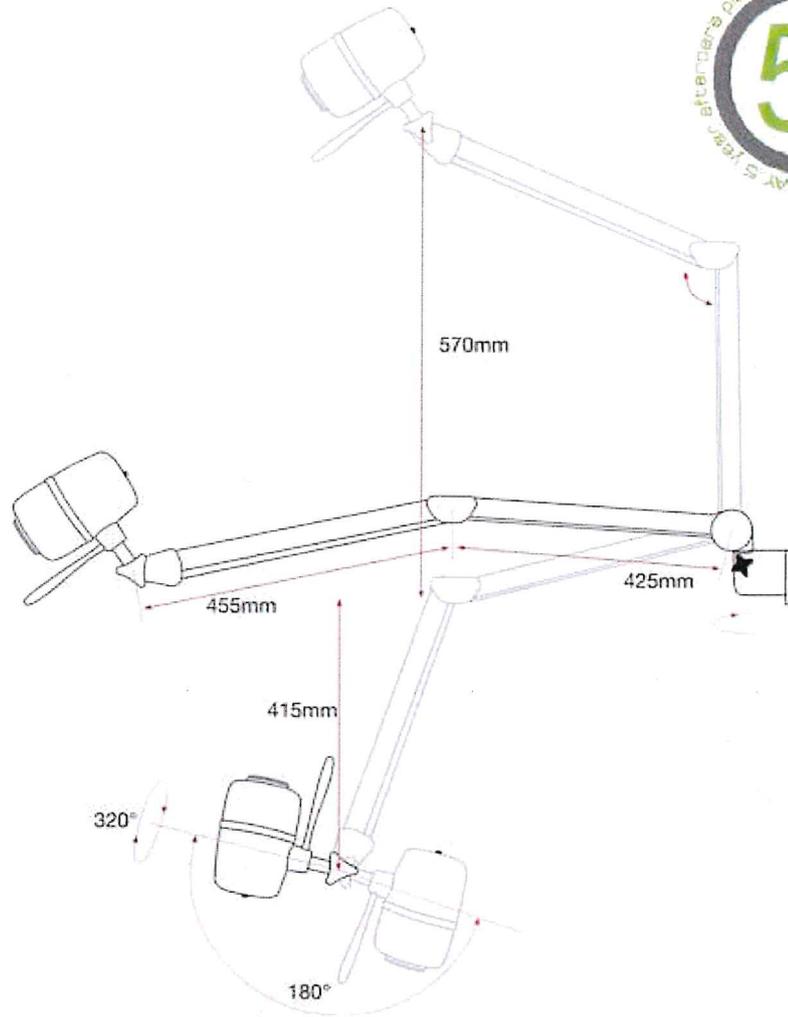
Medical Approvals/Certificates

The product(s) on this datasheet adhere to the following standards in line with the 93/42/EEC Medical Devices Directive - Classification: Class 1, Rule 1.

EN 13485	EN 60601-1-2
EN 14971	EN 60601-1-6
EN 9001	EN 60601-2-41
EN 60601-1	EN 1041
2014/35/EU Low Voltage Directive	EN 60598-2-25

Technical Drawings

X240 LED Wall Mount
 Total weight: 1.85kg
 Same dimensions apply for all other versions

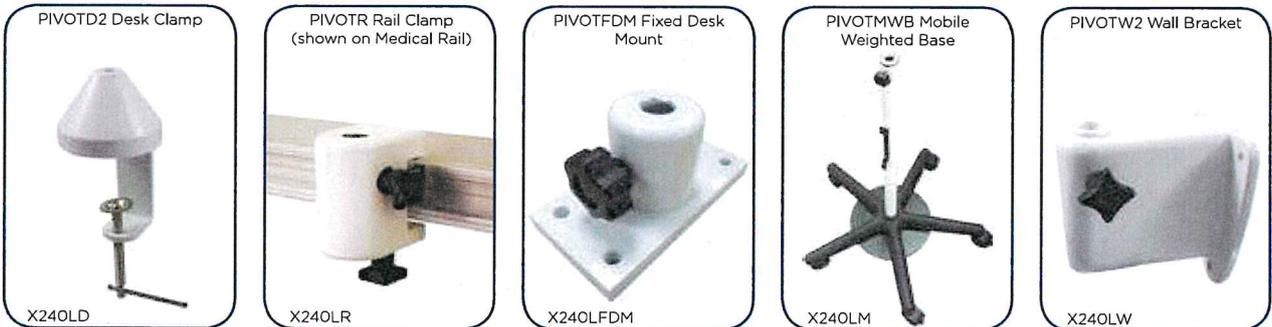


Recommended mounting height shown is for all wall and rail mount versions. Actual location should be dependent on intended use and desired reach.

Common sense should always prevail.

Mounting Options

These are DARAY's standard mounting options, and are all **interchangeable**.



Shown here are the hardwired special order mounting options, and are **not interchangeable**.

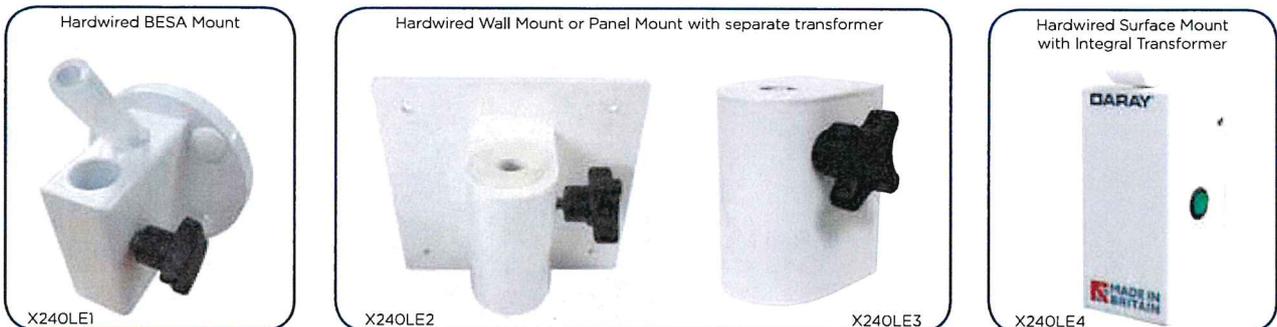


Image Gallery

X240 LED Hardwired Wall Mount with integral transformer
Code: X240LE4



Code: X240LE1



Code: X240LE2



Code: X240LE3



Code: X240LDS



Transformer housed in box at base of neck.
Box mounts directly to the wall.

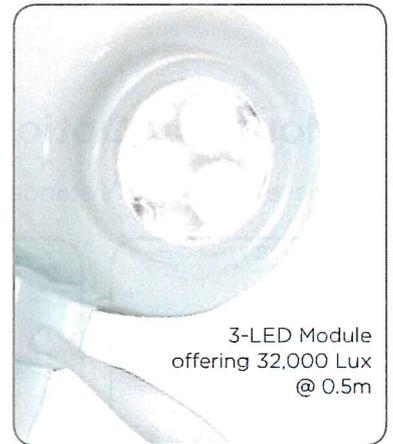


X240 LED Mobile
Code: X240LM

1700mm



X240 control switch on rear of head



3-LED Module offering 32,000 Lux @ 0.5m

X240 LED Wall Mount
Code: X240LW



X240 LED Rail Mount
Code: X240LR
(shown here on XRAIL Medical Rail - available separately)



CIBSE

LIG054
LIG058
LIG910
LIG9004

DARAY
Medical

Product Datasheet

Examination Light

X210

LED



Introduction

The X210 LED Examination Light is designed specifically for use during medical consultation and diagnosis. Utilising LED technology, this general examination light has been developed to provide an intense beam with excellent colour rendering properties.

This model has an integral transformer housed within the wall mount. We can supply this model either with an IEC cable into the side of the wall mount, or as an 'electricians fit' version which allows the cable to pass directly through the rear of the wall mount, for integration into mains services.

The X210 LED forms part of the **X200 LED Range**, which comprises the following models: X200, X210, X230, X240. All models in the X200 LED Range offer identical light output, though with differing mounting/wiring options:
X200 - Same as X240, though with a flexible 'gooseneck' instead of the articulated (spring-balanced) arm.
X210 - Available as a wall/rail mount solution with an integrated transformer, to be hardwired.
X230 - Provides a panel mount bracket and an angled neck for mounting to bed-head trunking, to be hardwired.
X240 - Same as X200, though with an articulated (spring-balanced) arm instead of the flexible 'gooseneck'.

Datasheets are available for each model in this Range.

Standard Features

- World-renowned LED technology
- Variable intensity
- Flexible gooseneck for versatile movement and solid positioning
- Excellent colour rendering - for totally natural skin tones
- BioProtect® anti-microbial coating to assist in infection control
- Fully positionable light head
- Various mounting options available
- Energy-efficient, environmentally friendly, and a fully recyclable product

Available Options

X210LW	DARAY X210 LED wall mounted examination light -- with IEC cable
X210LE	DARAY X210 LED wall mounted examination light -- electricians fit (flush fit)
X210LR	DARAY X210 LED rail mounted examination light (rail sold separately - see below) -- with IEC cable/Curled IEC
XRAIL	1m Medical Rail for mounting X210LR (includes wall fixings)

Bespoke solutions available, please call

Technical Specifications

Light Source	LED
Light Intensity (Lux) @ 0.5m	32,000 Lux \pm 5%
Light Intensity (Lux) @ 0.75m	14,000 Lux \pm 5%
Light Intensity (Lux) @ 1.0m	8,000 Lux \pm 5%
Light Intensity Adjustment Range	10 - 100%
Colour Temperature (Kelvin)	4,300K \pm 500
Colour Rendering Index (CRI)	95
Colour Rendering (R9)	88
Light Field Diameter (D50)	@ 0.5m: 120mm
	@ 0.75m: 135mm
	@ 1.0m: 180mm
Light Field Diameter (D10)	@ 0.5m: 230mm
	@ 0.75m: 325mm
	@ 1.0m: 460mm
Number of LED's	3
Power Consumption	12W 0.1A
Average Working Life	>50,000 Hours
Input Supply Rating	100 - 240V AC 50/60 Hz
Output Supply Rating	12V DC 1A
Temperature Rise on Patient/User	\leq 2°C
Warranty Period	5 Years
NHS E-Class Code	FBU, FKR
Commodity Code	9018 908400
GMDN Code	12276

Notes

The X210 has a low 'total cost of ownership', costing up to 75% less to run than equivalent halogen lights. This light has around 50,000 hours of life from the LED light engine equating to around 25 years of clinical use (based on 5.5 hours clinical use per day).

This model requires minimal maintenance and has a smooth, fully enclosed BioProtect® head to assist with the management of infection control. This is an ideal light for GP surgeries and clinics where flexibility and performance are crucial. Choose between wall and rail mounted options.

Medical Approvals/Certificates

The product(s) on this datasheet adhere to the following standards in line with the 93/42/EEC Medical Devices Directive - Classification: Class 1, Rule 1.

EN 13485

EN 14971

EN 9001

EN 60601-1

2006/95/EC Low Voltage Directive

EN 60601-1-2

EN 60601-1-6

EN 60601-2-41

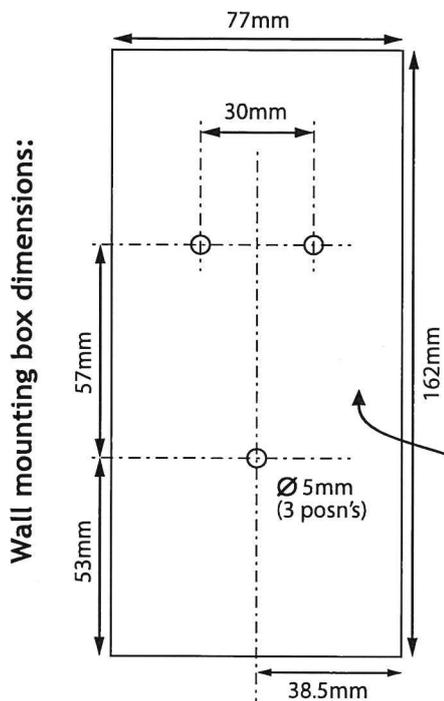
EN 1041

EN 60598-2-25

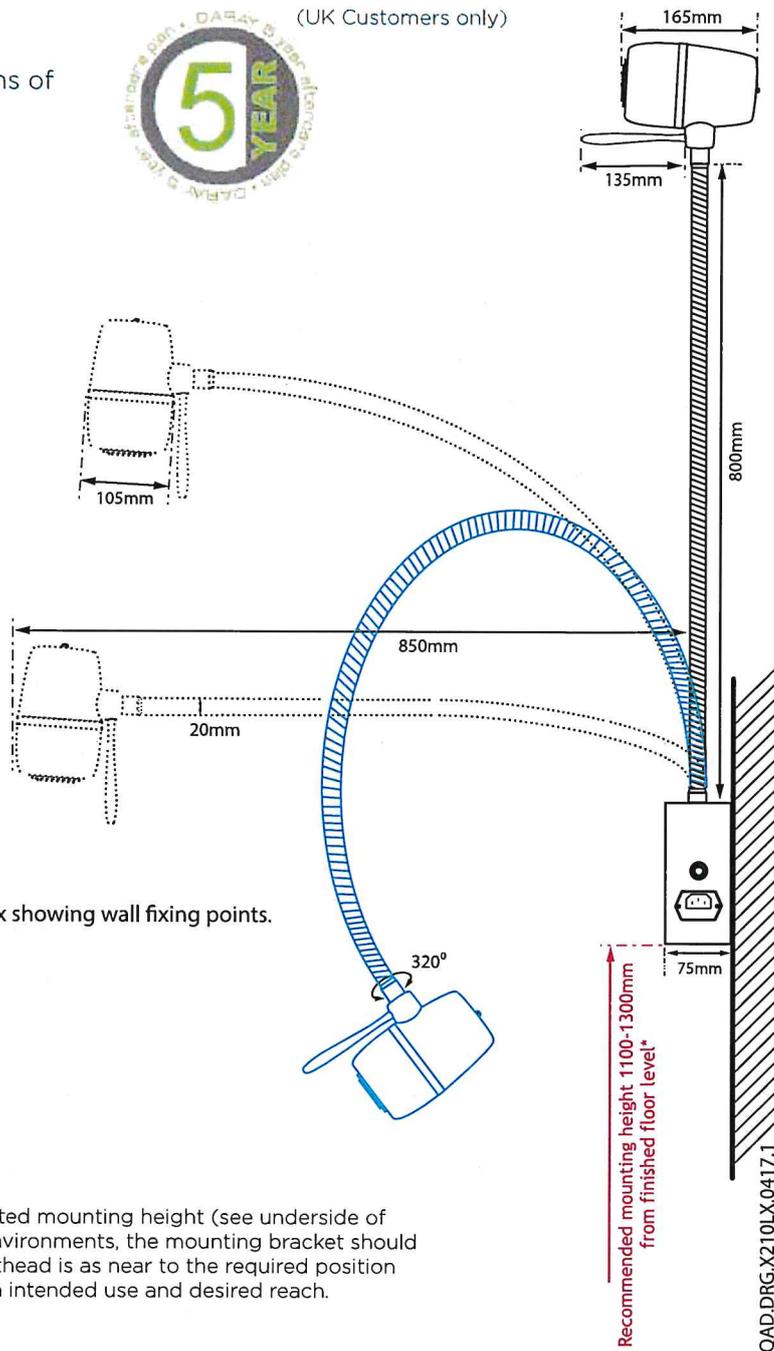
Technical Drawings

The below dimensions apply to all versions of the X210 LED Examination Light

(UK Customers only)



Rear of box showing wall fixing points.



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*All dimensions shown in red are based on a suggested mounting height (see underside of wall mounting box). For specific applications and environments, the mounting bracket should be installed at a height so that, when fitted, the lighthead is as near to the required position as possible. Actual location should be dependent on intended use and desired reach. Common sense should always prevail.

Mounting Options

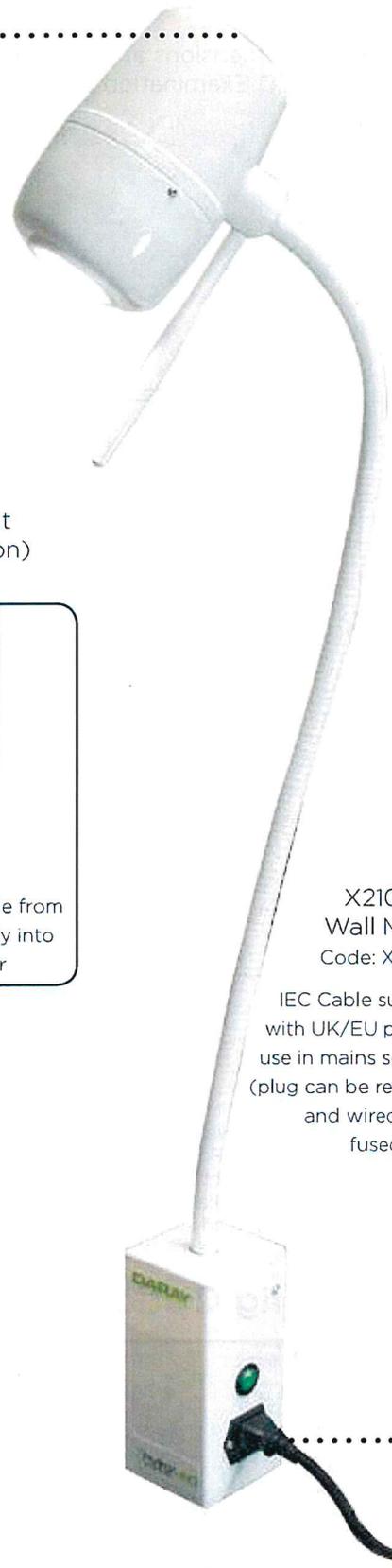


Image Gallery



320° Head Rotation

X210 LED control switch on rear of head



X210 LED Wall Mount (Electricians fit version)
Code: X210LE

X210 LED Wall Mount
Code: X210LW

IEC Cable supplied with UK/EU plug for use in mains sockets, (plug can be removed and wired into a fused spur)



3-LED Module offering 32,000 Lux @ 0.5m



Requires: Mains-fed cable from rear, wired appropriately into terminal connector



Left:
X210 LED Rail Mount
Code: X210LR
(shown here on XRAIL Medical Rail - available separately)