



E3

Equipment Energy
Efficiency

2010 Residential Lighting Report APPENDIX 4

April 2013



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and New Zealand Governments.

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Methodology - Field Survey Manuals





1. Lighting Field Guide – Lamp Fittings

Only consider fittings that are mains powered.

Fitting	Pictures	Notes
Batton Holder		A bare fitting, normally fixed directly to the ceiling
Batton Holder with Shade		A bare fitting, normally fixed directly to the ceiling, with a surrounding shade
Linear Fluorescent		Linear fluorescent, can be suspended, surface mounted or flush mounted. May or may not have a diffuser (cover)

Fitting	Pictures	Notes
Oyster		Batton Holder with cover (of any material), ceiling mounted only
Suspended		Any type of hanging fitting, may have more than one lamp, may be covered (with any material) or uncovered
Downlight/Flush Mounted		Recessed and flush with ceiling
Indoor Spotlight		Not flush mounted, may have a gimble fitting (allowing tilting of the lamp)
Uplight	No picture example – these fittings will be uncommon in houses	Directional fitting, which directs light upwards. Wall mounted
Wall Light		Wall mounted only




Fitting	Pictures	Notes
Fixed Floor Light	No picture example – these fittings will be very rare in houses	Fixed in the floor
Desk Lamp		Plug in, multi task lamp
Table Lamp		Plug in, decorative rather than task orientated
Floor/Standard Lamp		Plug in, can be decorative or task orientated. Generally lamp is set some distance from base
Combination Heat/Light Unit		Normally found in bathrooms, may comprise of two or more heating lamps usually also with lighting lamp






Fitting	Pictures	Notes
Nightlight		<p>Plug in, may be coloured, provides ambience rather than useful light</p>
Rangehood	<p>No picture example – this fitting is found in any Rangehood appliance</p>	<p>Normally found in kitchens, may comprise of one or more lights</p>
Floodlight/External Spotlight		<p>Normally outside lighting, may be directional, usually high wattage</p>
Garden Light		<p>Outside lighting, decorative rather than task orientated</p>
Novelty Light (Ignore for lamp technology audit purposes)	<p>No picture example – these fittings are generally plug in and not permanent</p>	<p>Decorative rather than task orientated, example include Fibreoptic lights, Lava lamps, Christmas lights, Fairy lights</p>
Pool Lights	<p>No picture example – normally found only in in-ground pools</p>	<p>Lamps mounted in a pool, under the surface of the water</p>
Other		<p>Give explanation</p>

2. Lighting Field Guide – Lamp Technology

What is the technology of the LIGHT SOURCE at the centre of the lamp?

Ignore the shape of the lamp's outer envelope.

Technology	Pictures	Notes
Incandescent - mains voltage	<p style="text-align: center;">no halogen capsule</p> 	<p>No halogen capsule – large filament.</p> <p>Ignore the outer envelope in the picture, as this can be many shapes.</p> <p>If frosted envelope such that burner cannot be seen, assume incandescent – mains voltage.</p>
Halogen - mains voltage	<p style="text-align: center;">halogen capsule</p> 	<p>Look for small halogen capsule at centre of lamp.</p> <p>Ignore the outer envelope in the LHS picture, as this can be many shapes including candle, reflector, etc.</p> <p>RHS picture is double-ended halogen (flood lights).</p>
Halogen - low voltage		<p>Look for small halogen capsule at centre of lamp.</p> <p>Lamp marked as “12V” or connected to transformer</p>






Technology	Pictures	Notes
Compact fluorescent - integral ballast		Look for fluorescent tube
Compact fluorescent - separate ballast		Note pin cap
Linear fluorescent		
Circular fluorescent		
LED		Typically have a cluster of diodes

Technology	Pictures	Notes
Heat Lamp		Typically very large

3. Lighting Field Guide – Lamp Shape



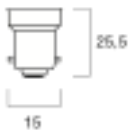


What is the SHAPE of the lamp's outer envelope?

Shape	Pictures	Notes
A-shape		Pear, tubular and mushroom shaped
Fancy round		Spherical shape, can be small or large
Candle		
Reflector - R		Includes MR (multi-faceted) reflector lamps
Reflector - PAR		Large diameter, thick quartz lens
Pilot		Small size



Shape	Pictures	Notes
Double ended		
(Halogen - low voltage) reflector		
Capsule		
(Compact fluorescent) stick		
(Compact fluorescent) spiral		
(Compact fluorescent) covered		
(Compact fluorescent) reflector		Directional light source

Shape	Pictures	Notes
(LED) reflector		Directional light source
(LED) non-reflector		Multi-directional light source

3.1 Cap

Cap	Pictures	Notes
E14		Small screw
E27		Large screw
B15		Small bayonet
B22		Large bayonet
GU10		Note pins have enlarged heads

4. Transformer

Transformer	Pictures	Notes
Halogen – low voltage – magnetic		Approx 200+ mm long
Halogen – low voltage - electronic		Smaller and lighter than magnetic



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