

# \* AA LAMPS Information

## Hollow Cathode Lamps for Atomic Absorption

Glass Expansion has released a full range of Hollow Cathode Lamps to suit atomic absorption spectrophotometers from all major manufacturers. We supply standard uncoded lamps to suit all models plus data coded lamps for Agilent/Varian, Thermo Fisher and PerkinElmer instruments.

Our lamps are fully guaranteed and each lamp is individually tested to ensure optimal performance in your customer's instrument. The test data for each lamp is stored and tracked by serial number. Our lamps are guaranteed for 2 years or 5000 milliampere-hours, whichever comes first. Rigid quality control ensures that all lamps meet the same high standard for intensity, stability and spectral purity.

1.5inch (37mm) Lamp:



2inch (51mm) Lamp:



### Our lamps feature:

- Intense emission of resonance lines
- Narrow line width for maximum sensitivity and linearity
- Minimal spectral interference
- Rapid warm up and stable long term emission
- Low noise operation
- Long running life and a 5 year shelf life
- Careful selection of cathode materials and geometry to achieve a combination of spectral purity and optimal sputtering rate

## Hollow Cathode Lamps (cont.)

### Ordering Information

Our Hollow Cathode Lamp range includes the following types:

#### 1.5inch (37mm) diameter uncoded 2 pin lamps

Suitable for: Agilent/Varian  
Analytik Jena  
GBC  
Hitachi  
Shimadzu  
Thermo Fisher



#### 1.5inch (37mm) diameter Agilent/Varian coded 4 pin lamps

Suitable for: Agilent/Varian  
GBC



#### 1.5inch (37mm) diameter Thermo Fisher coded 7 pin lamps

Suitable for: Thermo Fisher



#### 2inch (51mm) diameter uncoded 9 pin lamps

Suitable for: PerkinElmer



#### 2inch (51mm) diameter coded Intensitron 12 pin lamps

Suitable for: PerkinElmer



#### 2inch (51mm) diameter coded cableless 4 pin lamps

Suitable for: PerkinElmer



### Sales Strategy

Our hollow cathode lamps are made to the same high quality as all Glass Expansion products and they are guaranteed for 2 years or 5000 milliampere-hours, whichever comes first. They provide equivalent performance to the lamps supplied by the AA manufacturers but at a significantly lower price. We can supply lamps for all AA models and we hold the most popular types in stock for immediate delivery.

## D-Torch for Agilent 5100 and 5110

The D-Torch provides the benefits of a fully demountable torch at a significantly lower cost. We have previously released the D-Torch for many ICP-OES and ICP-MS models. D-Torches are now also available for the Agilent 5100 and 5110 models.

### Ordering Information

Part No.	Description
<a href="#">30-808-3560</a>	D-Torch for Agilent 5100/5110 SVDV/VDV
<a href="#">30-808-3590</a>	D-Torch for Agilent 5100/5110 RV
<a href="#">31-808-3568</a>	Base and Inner Tube for D-Torch
<a href="#">31-808-3570</a>	Quartz Outer Tube for 5100/5110 SVDV/VDV D-Torch
<a href="#">31-808-3580</a>	Ceramic Outer Tube for 5100/5110 SVDV/VDV D-Torch
<a href="#">31-808-3582</a>	Quartz Outer Tube for 5100/5110 RV D-Torch
<a href="#">31-808-3586</a>	Ceramic Outer Tube for 5100/5110 RV D-Torch
<a href="#">31-808-3576</a>	Tapered Quartz Injector 1.8mm for D-Torch
<a href="#">31-808-3585</a>	Tapered Ceramic Injector 1.8mm for D-Torch

### Sales Strategy

The D-Torch is a cost-effective alternative to the standard fixed torch or semi-demountable torch. It will save money for any laboratory with a moderate workload. In most cases, when the torch wears, the customer will only need to replace the outer tube instead of replacing the entire torch. In addition, interchangeable injectors are available to suit samples with organics, high solids or HF.

Ceramic outer tubes are available for the Agilent 5100 and 5110 D-Torch. The ceramic outer tube has a much longer lifetime, greatly reducing interruptions and downtime due to torch failure. The ceramic outer tube is of particular benefit for:

- a) the analysis of wear metals in engine oils, where quartz outer tubes often suffer from short lifetime.
- b) Si determinations, where quartz outer tubes often produce high background signals.
- c) fusion samples or samples with high levels of dissolved solids which cause quartz tubes to devitrefy.

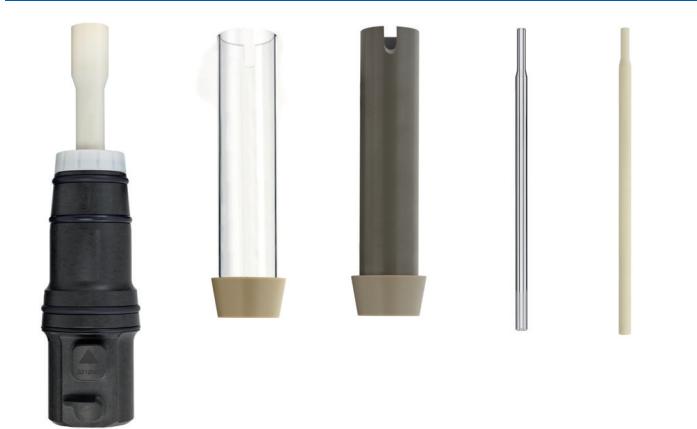
The D-Torch is a patented Glass Expansion invention and there is no competitive product available.

Click [here](#) to see the full D-Torch range.

D-Torch for Agilent 5100/5110 SVDV/VDV



Base and inner tube    Quartz outer tube    Ceramic outer tube    Quartz injector    Ceramic injector



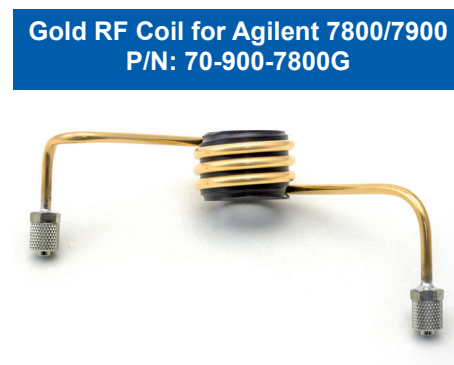
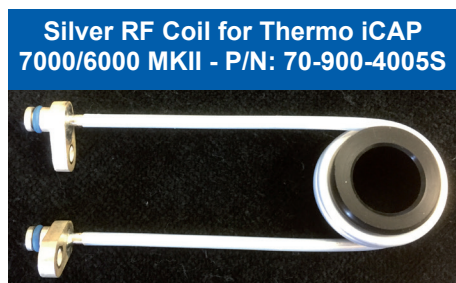
## New RF Coils for: Thermo iCAP 7000/6000 MK II, Agilent 7700/8800 and Agilent 7800/7900

Glass Expansion has expanded its range of RF coils to include coils for the Thermo iCAP 7000/6000 MK II, Agilent 7700/8800 and Agilent 7800/7900. The Thermo coils are available with silver or gold plating, with silver giving the most efficient energy transfer but gold being more resistant to corrosion. The Agilent coils are available in copper or with silver or gold plating. Copper is the lowest cost but silver provides enhanced efficiency and gold provides longer lifetime with corrosive samples. Each coil is supplied on a plastic former, ensuring correct dimensions are maintained during transport, and simplifying installation. A re-usable installation kit with full instructions is also available.

### Ordering Information

Part No.	Description
<a href="#">70-900-4005S</a>	RF Coil Silver for Thermo iCAP 7000/6000 Mark II
<a href="#">70-900-4005G</a>	RF Coil Gold for Thermo iCAP 7000/6000 Mark II
<a href="#">70-900-7700C</a>	RF Coil Copper for Agilent 7700/8800
<a href="#">70-900-7700S</a>	RF Coil Silver for Agilent 7700/8800
<a href="#">70-900-7700G</a>	RF Coil Gold for Agilent 7700/8800
<a href="#">70-900-7800C</a>	RF Coil Copper for Agilent 7800/7900
<a href="#">70-900-7800S</a>	RF Coil Silver for Agilent 7800/7900
<a href="#">70-900-7800G</a>	RF Coil Gold for Agilent 7800/7900

Glass Expansion RF coils are also available for a wide range of ICP-OES and ICP-MS models. Click [here](#) for details on our full range of RF coils.



### Sales Strategy

Most ICP manufacturers advise customers to have their RF coils installed by a service engineer. This makes coil replacement a very expensive exercise and results in many users delaying replacement of a corroded coil, to the detriment of instrument performance. With Glass Expansion's re-useable installation kits and comprehensive instructions, coil replacement is straightforward. Replacement of a corroded coil results in a more consistent plasma, better analytical results and also reduces stress on the RF generator.

We provide a wider choice of coil than the ICP companies. The standard coils for the Agilent 7700/8800 and 7800/7900 are raw copper. We can provide a direct replacement for these but we also offer a silver-plated coil, which provides more efficient energy transfer, and a gold-plated coil, which provides much better corrosion-resistance than copper as well as more efficient energy transfer. The standard Thermo coil is silver-plated. We can provide a direct replacement for this as well as the option of a gold-plated coil for improved corrosion-resistance.