



## 7XX30 Model

1, 2, 10, 20, 30kV low cost laboratory unit



### Specification Summary

The 7XX30 range of high voltage power supplies are used primarily as laboratory power supplies. The power supply has an LED digital voltage reading, adjustable voltage range, highly stable output and low ripple. The unit is available in positive or negative polarity and one or two output connectors depending on customer requirements.

Both AC and DC input units are supplied with HV output cables. AC input unit is also supplied with IEC connector and cable, and DC input unit is supplied with 24V 5 way XLR connector (female).

#### Input Specifications

DC input voltage range	22 - 26VDC
AC input voltage range	85 - 260VAC
DC input current	2.5A maximum. At full power and minimum input voltage
Efficiency at full load	More than 70%

#### Output Specifications

	70130	70230	71030	72030	73030
Output voltage range*	0-1kV	0-2kV	0-10kV	0-20kV	0-30kV
Maximum output current	30mA	15mA	3.0mA	1.5mA	1.0mA
Output power	0 to 30W				
Output polarity	Positive or negative with respect to ground				
Voltage load regulation	Less than 0.01% for a load changing from no load to full load.				

Voltage line regulation	Less than 0.3% for an input changing from maximum input to minimum input.
Voltage ripple	Less than 0.01% (peak to peak) of maximum output voltage.
Voltage stability	Less than 0.05% for 8 hours per day with 30 min. warm-up.
Temperature coefficient	Less than 200ppm/°C over the specified temperature.

*\*For other output voltages please contact the factory.*

#### Circuit Protection

- Overload, arcing and short circuit
- Unit enters constant current mode when fault occurs
- DC input unit protected against reverse polarity from power supply

#### Options

- Remote interlock available on DC input version
- Dual HV output sockets
- Dual meters
- Mounting bars

*Please specify when ordering. For further information please contact the factory.*

#### Reliability and Quality Control

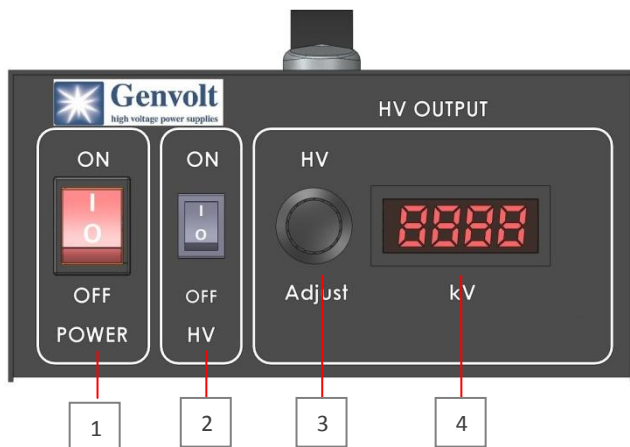
- Each power supply has been soak tested with full load at 40°C for no less than 24 hours.

#### Model Number

7XX30  
Model ———— Output power  
Output voltage ————

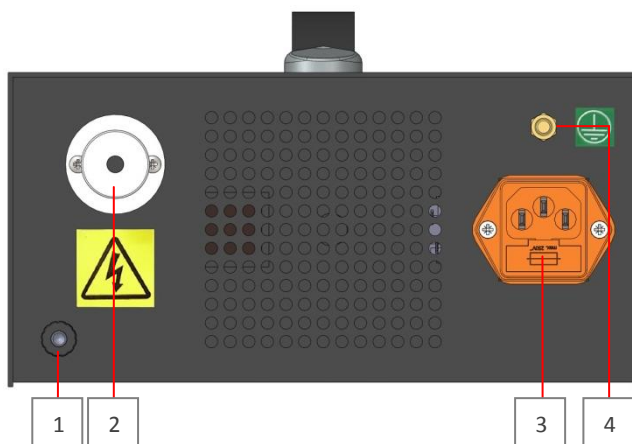


## Front Panel



1	POWER	Mains power ON/OFF switch
2	HV	High voltage ON/OFF switch
3	HV Adjust	10-turn potentiometer for adjusting output voltage
4	kV	Digital display for output voltage

## Back Panel



1	4mm socket terminal: High voltage ground
2	High voltage output connector
3	Input connector: available in both DC 5 way connector or AC standard IEC connector.
4	M6 for earth bonding

## Environmental Details

Operating temperature	0 to 40°C
Storage temperature	-20 to 60°C
Humidity	0 to 90% non-condensing

## Mechanical Details

Weight	DC input: 2.8kg (6.17lbs) AC input: 3.6kg (7.94lbs)
Dimensions	Width 200mm, height 100mm, depth 300mm
Power input connector	AC input: standard IEC connector DC input: 24V 5 way XLR connector (male)

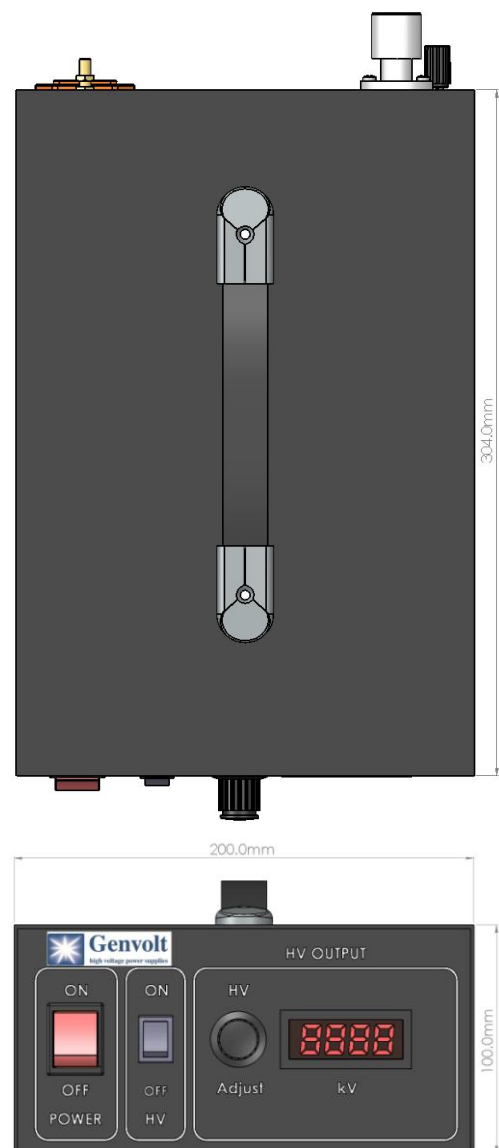
## HV output connector

Genvolt 30kV HV connector

## Safety

- This power supply contains hazardous voltages and stored energy. Contact with the output may result in fatal injury. It should only be used and maintained by trained personnel.
- The area where the power supply is to be used should be kept clean and dry.
- Before switch the power supply on please confirm that the 10-turn potentiometer is turned fully in counter-clockwise.
- Keep a safe distance from the output connector and any items connected to it.
- Ensure that a secure connection is made between the Earth side of the load and the green and yellow Earth lead.

## Dimensions



*For requirements other than those specified, please do not hesitate to contact the factory. Please note that design improvements may lead to specification changes.*