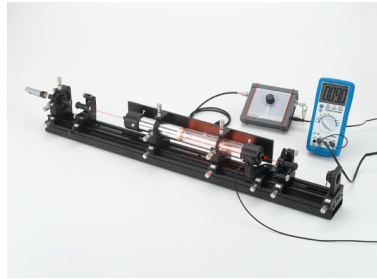


Helium Neon laser

Numero P5.8.5.5



Descrizione

The experiment P5.8.5.5 realises a Helium Neon laser from basic parts. The open frame cavity allows the variation of parameters to measure the beam profile for different cavity mirror configurations and distances. The laser tube is equipped with a Brewster's window on both sides allowing the study of polarisation and losses. Optionally, a Littrow prism selects other wavelengths than the main laser line at 632 nm, especially the orange line at 611 nm. Further line tuning is demonstrated by means of the optional birefringent tuner. 4 different lines can be demonstrated by this element. An etalon is used to obtain the single mode operation of the Helium Neon laser.

Dispositivi

Richiesto	Dispositivo
0/1	Laser Mirror OC 632, flat, M16 Mount
0/1	Laser Mirror VIS 700, M16 Mount
0/1	Laser Mirror VIS 1000, M16 Mount
0/1	Laser Mirror, flat, M16 Mount
0/1	Laser Mirror Adjustment Holder, left
0/1	Laser Mirror Adjustment Holder, right
0/1	Single Mode Etalon, Adjustmend Holder
0/1	Spatial filter with adjustable iris
0/1	Module G (SiPIN) photodetector on swivel arm
0/1	Digital multimeter 3340
0/1	Screened cable, BNC/4 mm Plug
0/1	BNC adapter, straight
0/1	HeNe Laser High Voltage supply, adjustable
0/1	Main Laser Tube with XY-Adjustment
0/1	Pilot laser 532 nm (green)
0/1	Profile Rail 1000 mm
0/1	Optics cleaning set
0/1	Ethanol, absolute, 250 ml
0/2	Transport and Storage Box #01
0/1	LIT-print: HeNe Laser
(0/1)	Littrow prism with adjustment holder
(0/1)	Birefringent tuner
(0/2)	Laser Mirror IR 713, M16 Mount
(0/1)	IR converter screen 800 - 1400 nm
(0/2)	Adjustment goggles for He-Ne-laser