A Multi-wavelength Study on Blue Compact Dwarf Haro 6
I. Dynamical Structure

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We present high resolution H-alpha spectra of blue compact dwarf (BCD) Haro 6 (also known as CTS1027, VCC144 or 1212+06) in Virgo Cluster. The long-slit spectroscopy was carried out at three position angles; i.e., P.A.=0, 30, and 120 degrees. With the mean intrinsic axial ratio <q>=0.3, we derived inclination of the system as i=39.7 using our composite V-band CCD image. Careful analysis on the velocity field shows that Haro 6 rotates like a rigid body in the central 6 arcsec region and differentially in the outer part (r>6 arcsec). The maximum rotational velocity v(r)max reaches about 26 km/sec at radius of 6 arcsec. The calculation of the mass of the galaxy employing simple mass model will be briefly discussed. Emphasis will be given on mass-to-luminosity ratios based on published data and our own.

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