Asymmetric line profiles in the spectra of gaseous metal disks around single DAZ white dwarfs

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Around several single DAZ and DBZ white dwarfs metal rich disks have been observed, which are mostly believed to originate from disruption of smaller rocky planetesimals. In some cases the material does not (only) form a dusty but gaseous disk. In the case of SDSS 1228+1040 the double peaked infrared CaII triplet $\lambda\lambda\,8498, 8542, 8662\,\text{Å}$, one of only two emission features of the spectra, exhibits a strong red/violet asymmetry. Assuming a composition similar to a chondrite-like asteroid, being the most prominent type in our own solar system, we calculated the spectrum and vertical structure of the disk using the Tübingen non-LTE A*ccretion* D*isk* c*ode AcDc*. Modified to simulate different non axis-symmetrical disk geometries, the first preliminary results are in good agreement with the observed asymmetric line profile.