

## MAIN TRENDS OF THE MAIN SEQUENCE – THE CRUCIAL EFFECT OF VIRIAL FACTOR

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We address the effect of orientation of the accretion disk plane and the geometry of the broad line region (BLR) in the context of understanding the broad distribution of quasars. We utilize photoionization code CLOUDY to model the BLR in the context of Quasar Main Sequence, incorporating the grossly underestimated virial factor ( $f$ ). Treating the aspect of viewing angle appropriately, we re-discover the dependence of the RFe sequence on L/LEdd ratio and the related observational trends - as a function of the SED shape, cloud density and composition, verified from prior observations. Sources with RFe in the range 1 – 2 (about 10% of all quasars, the so-called extreme Population A [xA] quasars) are explained as sources of high, and possibly extreme Eddington ratio along the RFe sequence. This result has important implication for the exploitation of xA sources as distance indicators for Cosmology. FeII emitters with RFe > 2 are very rare (<1 % of all type 1 quasars). Our approach also explains the rarity of these highest FeII emitters as extreme xA sources.