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ON THE QUASAR MAIN SEQUENCE AT HIGH REDSHIFT: AGN OUTFLOWS AND RADIOLOUDNESS RELATIONS

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Active Galactic Nuclei (AGN) outflows and winds in general seem to be an ubiquitous feature. Especially at high and intermediate redshift, many sources seem to harbour a powerful central mechanism that allows for strong jets in radio and/or winds observed in the optical and UV ranges of their spectra. Through the decomposition of the broad emission line profiles we are able to find some hint of the real relevance of winds for the structure and dynamics of the broad line emitting regions. Feedback contributions can be estimated through the decomposition of the broad emission line profiles from quasar spectra and high-ionisation lines such as C IVλ1549 and [O III]$\lambda\lambda$4959,5007. High-ionisation lines usually present a significant asymmetry towards the blue especially in radio-quiet sources that is strong evidence of outflow motions. At variance, radio-loud quasars tend to present modest blueshifted components and more symmetric profiles in both UV and optical ranges. In this work, we present a remarkable sample of 32 high-luminosity and high-redshift quasars ($z = 1.5\tilde{}3.7$) observed with ESO-VLT. Measurements are shown and contextualized taking advantage of a set of correlations associated with the quasar Main Sequence (MS), which consists of a parameter space that allows to connect observed UV, optical, and X-ray properties to the relative relevance of radiative and gravitational forces. We discuss the main differences found in accretion and feedback properties and highlight the effects of the radio-loudness on the emission line properties.