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## Nature vs nurture: what shapes the hybrid jet morphology of radio galaxies?

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Hybrid morphology radio sources (HyMoRS) are a rare type of radio galaxy that display distinct Fanaroff-Riley classes on opposite sides of their nuclei. To increase number statistic in the analyses of hybrid morphology radio sources, our team embarked on a large-scale search of these sources within the international citizen science project, the Radio Galaxy Zoo. In the first stage of this study we find 25 new candidate hybrid morphology radio galaxies, at redshifts  $0.07 < z < 1.0$ . In this talk I will present our investigations into the hosts of HyMoRS: for a third of the candidates spectroscopic observations reveal a variety of hosts including quasars, green bean galaxies, and high- and low-excitation galaxies. I will also discuss hybrid radio morphology formation in terms of the radio source environment (nurture) and intrinsically occurring phenomena (nature; activity cessation and amplification), showing that in principle these peculiar radio galaxies can be formed by both mechanisms. Finally, I will present and discuss deep and high resolution follow up radio images of one of our candidates, and the additional information these observations reveal.

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**Classifica Sessioni:** A historical perspective of the Third Cambridge catalogue