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Cop numbers of generalised Petersen graphs

It was previously proved by Ball et al. (2015) that the cop number of any generalised Petersen graph is at most 4. I will present results that determine the cop number for all of the known generalised Petersen graphs that actually have cop number 4, and that place them in the context of infinite families. The same proof techniques also show that any graph with girth at least 9 and minimum degree δ has cop number strictly greater than δ ; this represents a minor improvement to this special case of Frankl's more general bound. My talk is based on joint work with Harmony Morris, Tigana Runte, and Adrian Skelton.