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A search for new physics with multilepton final states by the CMS experiment at the Large Hadron Collider[1] MARIEL TADER, Case Western Reserve University, CMS COLLABORATION — Many models of physics beyond the standard model predict events that contain three or more leptons with or without extra jets, missing energy, accompanying b-quarks, etc. Supersymmetry is the most well-known source of such multilepton events, but other new physics theories such as the see-saw mechanism, two Higgs Doublet models, flavor-changing decays of the top quark to the higgs and charm final states, etc, can also yield multileptons. This presentation describes an inclusive search for new physics with multileptons carried out by the CMS experiment using 2012 proton-proton collision data from the Large Hadron Collider.

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