

*Characterizing Metamorphosed Ultramafics in Carrollton, GA*

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Metamorphosed ultramafic rocks in and near Carrollton, GA occur in isolated lenses, making them distinct from surrounding metapelitic rocks. The geologic literature of the region lacks in depth characterization and descriptions of these lenses. Early inspection of hand samples and thin sections of these rocks, using polarized light microscopy, indicates that these formed from pyroxene-rich protoliths, rather than peridotites, previously alluded in regional literature. Systematic testing via EPMA, XRF, ICP-MS and XRD was employed to secure a foundation of critical information and more accurately and extensively characterize these anomalous pods of rock. These rocks have undergone minimal to extensive weathering, resulting in a wide array of secondary minerals and textures. Despite this, major- and trace- element concentrations continue to reflect an ultramafic origin. These data are being drawn upon for higher-stage analysis, refined interpretations regarding the protolith, emplacement of these rocks, and how this fits into the geologic history of the West Georgia region.