

FIGURE 2.5.1-231 (SHEET 1 OF 2)

DESCRIPTION OF GEOLOGIC UNITS SHOWN IN FIGURE 2.5.1-231, SHEET 1

- **CZbg**BIOTITE GNEISS AND SCHIST Inequigranular and megacrystic; in places contains garnet; interlayered and gradational with mica schist and amphibolite; includes small masses of granitic rock.
- METAMORPHOSED LEUCOGRANITE OF THE BUCKHORN DAM INTRUSIVE SUITE Light-colored, medium- to coarse-grained rocks with poorly developed foliation; composed mainly of plagioclase, quartz, and microcline with minor amounts of chlorite, sericite, epidote, biotite, and opaque minerals. The color index is usually less than 5.
- METAMORPHOSED MAFIC ROCKS Metagabbro and metadiorite: Dark green, coarse- to fine-grained, variably foliated rocks composed mainly of epidote, chlorite, hornblende (and/or actinolite), plagioclase, opaque minerals, and minor quartz.
- CZbr3 BIG LAKE-RAVEN ROCK SCHIST 3 Light tan to orange brown, fine- to medium-grained, white mica schist to gneiss.
 - MAFIC METAVOLCANIC ROCK Metamorphosed basalt flows and tuffs, dark green to black; interbedded with felsic and intermediate metavolcanic rock and metamudstone.
- Jd JURASSIC DIABASE DIKES
- PzZbg2 DUNCAN METAGRANITE Light pinkish gray, medium-grained, nonfoliated to weakly foliated, leucocratic (CI<10) garnet- and epidote-bearing biotite metagranite.

Source: NCGS (2006)

- Trcc CONGLOMERATE Reddish brown to dark brown, irregularly bedded, poorly sorted, cobble to boulder conglomerate. Consists of >50% conglomerate. Clasts are mostly felsic and intermediate metavolcanic rocks, quartz, epidote, bluish gray quartz crystal tuff, muscovite schist, and rare metagranitic material.
- Trcs
 INTERBEDDED SANDSTONE/PEBBLY SANDSTONE (Lithofacies Association II Reddish brown to dark bown, irregularly bedded to massive, poorly to moderately sorted, medium- to coarse-grained, muddy lithic arkoses, with occasional, matrix-supported granules and pebbles as 1 to 5 cm basal layers.
- Trcs/si2

 SANDSTONE WITH INTERBEDDED SILTSTONE (Lithofacies Association II Whitish yellow to grayish pink to pale red, coarse-to very coarse grained, trough cross-bedded lithic arkose that fines upward through yellow to reddish brown, burrowed, rooted siltstone.
- Trcsi/s

 SILTSTONE WITH INTERBEDDED SANDSTONE
 Lithofacies Association II Reddish brown, extensively
 bioturbated, muscovite-bearing siltstone interbedded
 with tan to brown, fine- to medium-grained, muscovitebearing, arkosic sandstone, usually less than one meter thick.
- Trcs/c SANDSTONE WITH INTERBEDDED CONGLOMERATE Lithofacies Association II Reddish brown to dark brown, irregularly bedded, poorly sorted, coarse-grained to pebbly, muddy lithic sandstones with interbedded pebble to cobble conglomerate.
- Qal QUATERNARY ALLUVIUM

Progress Energy Carolinas

Shearon Harris Nuclear Power Plant Units 2 and 3 Part 2, Final Safety Analysis Report

New Hill, North Carolina

Site Area Geologic Maps (8-km [5-mi.] Radius)

FIGURE 2.5.1-231 (SHEET 2 OF 2)

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