Moscow shale

This formation rests on the Tichenor limestone and consists of soft, light bluish gray shales that are usually somewhat calcareous and embrace several courses of concretions. The latter become at some exposures continuous concretionary layers crowded with fossils. In the central part of the State, from Ontario to Chenango counties, the Moscow shale is separated from the black Genesee shale above by the Tully limestone. But both the Genesee shale and the Tully limestone fail to extend to this quadrangle as distinct formations. On Canandaigua lake and westward as far as this quadrangle the Tully horizon is marked only by thin lentils of iron pyrites and the Genesee black shale though 90 feet thick in Ontario county thins out toward the west to so great an extent that it barely reaches the eastern part of this quadrangle, being there but a few inches thick. As a lithologic unit it is absent in the exposures on Smoke's creek and Rush creek and along the lake shore, for no black shales appear between the top of the Moscow shale and the Genundewah limestone. Genesee fossils, however, are found a few inches below the Genundewah limestone in beds of light colored shale and soft limestone, that contain also a small number of Tully and Hamilton species.

Including the 12 to 15 inches of transitional beds at the top just mentioned, the Moscow shales are 17 feet thick at Eighteen Mile creek. Increasing rapidly toward the north and east they measure 52 feet on the south branch of Smoke's creek at Windom, where the entire formation is favorably exposed between the two crossings of the electric railroad over the stream. There are also some slight exposures above the Tichenor limestone along the railroad and Rush creek near Big Tree.

The Moscow shales are everywhere exceedingly rich in fossils, but the specimens are, as a rule, not so well preserved as in the Ludlowville shale, and there is little difference between the faunas of the Moscow and Ludlowville shales. Dr Grabau reports 51 species from the latter in the Eighteen Mile creek region and the following are the common forms:

Phacops rana (Green)
Tentaculites gracilistriatus Hall
Palaeoneilo tenuistriata Hall
Pholidops hamiltoniae Hall
Spirifer tullius Hall
S. consobrinus d'Orbigny
Chonetes deflectus Hall

C. mucronatus Hall
Leptostrophia perplana (Conrad)
Ambocoelia umbonata (Conrad)
Atrypa reticularis (Linnè)
A. aspera (Dalman)
Streptelasma rectum Hall
Cystiphyllum conifollis Hall