

Name: _____

Student No.: _____

SOIL 3600 – Soils and Landscapes in Our Environment

LABORATORY 2

REGOSOL, BRUNISOL, CHERNOZEM, MOTTLES, ETHIOPIA, AND FIELD TRIP PREPARATION

I. MOTTLES

Explain what is meant by “abundance of mottles” when describing soil horizons? What are the classes of abundance of mottles?

Explain what is meant by “size of mottles” when describing soil horizons? What are the classes of sizes of mottles?

II. Ethiopia

Give one dominant soil group in Ethiopia?

What are the characteristics of that soil group?

III. RED RIVER OF MANTIOPA

Examine the area north of R.3E for soil series names. Where are the Red River Clay, Osbourne Clay and St. Norbert Clay generally located?

Can you see a direction of features left behind by glaciation? What direction? What is the feature?

What soil series are associated with the feature?

IV. CARROT RIVER

Why this a Regosol?

Is there evidence of buried horizons? How so?

What evidence is there of gleiing?

V. TELFORD

Why is this a Brunisol?

What kind of A horizon does this soil have? Why?

Any features of lacustrine deposition in the C horizon?

VI. MELEB

What evidence of gleiing is there?

What is the thickness of the master horizons (there are four of them)?

VII. CHERNOZEMS

Which soil has the thickest Ah? What is the thickness?

Which soil is likely best drained? What evidence of this?

How far do roots go down in each of the soils?

VIII. KELD

How is gleying evident?

Mottling is evident in what horizon?

How is mottling evident there?

What is the abundance and size of the mottles?