

HANTS COUNTY**Sample Number**

CP-30

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** L. E. Shaw clay pit located 480 m south of Shubenacadie on the eastern side of Highway 2 going from Shubenacadie to Milford (Fig. 41).**UTM:** 467650 E
4991940 N**GEOLOGICAL UNIT:** Clay, Early Cretaceous age**DESCRIPTION:** Varicoloured (light grey-greenish grey-dark grey) clay containing pyrite. Overlain by a layer of carbonaceous material.**SAMPLE INTERVAL:** Grab sample from stockpile**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Brownish-grey, noncalcareous clay. Very good workability. Very plastic. Water of plasticity 27.2%. Safe drying. Air shrinkage 5.7%. Modulus of rupture 212 p.s.i. Benzidine test negative.**P.C.E.:** 29**FIRED CHARACTERISTICS:**

Temp °F	Fired Shrinkage %	Absorption %	Colour	Hardness
1785	2.29	21.95	Off white	Hard
1850	2.97	21.51	Off cream	Hard
1920	3.59	19.65	Cream	Hard
1980	4.27	18.22	Cream	Hard
2040	4.40	18.05	Cream	Very hard
2092	4.59	16.50	Cream	Very hard
2140	5.06	15.27	Cream	Very hard
2185	5.53	13.34	Cream	Steel hard
2225	5.64	11.80	Cream	Steel hard
2255	5.35	9.09	Cream	Steel hard
2275	6.63	8.68	Cream	Steel hard
2298	7.04	6.55	Cream	Steel hard

POTENTIAL USES: This material is presently being quarried for use as medium duty refractories

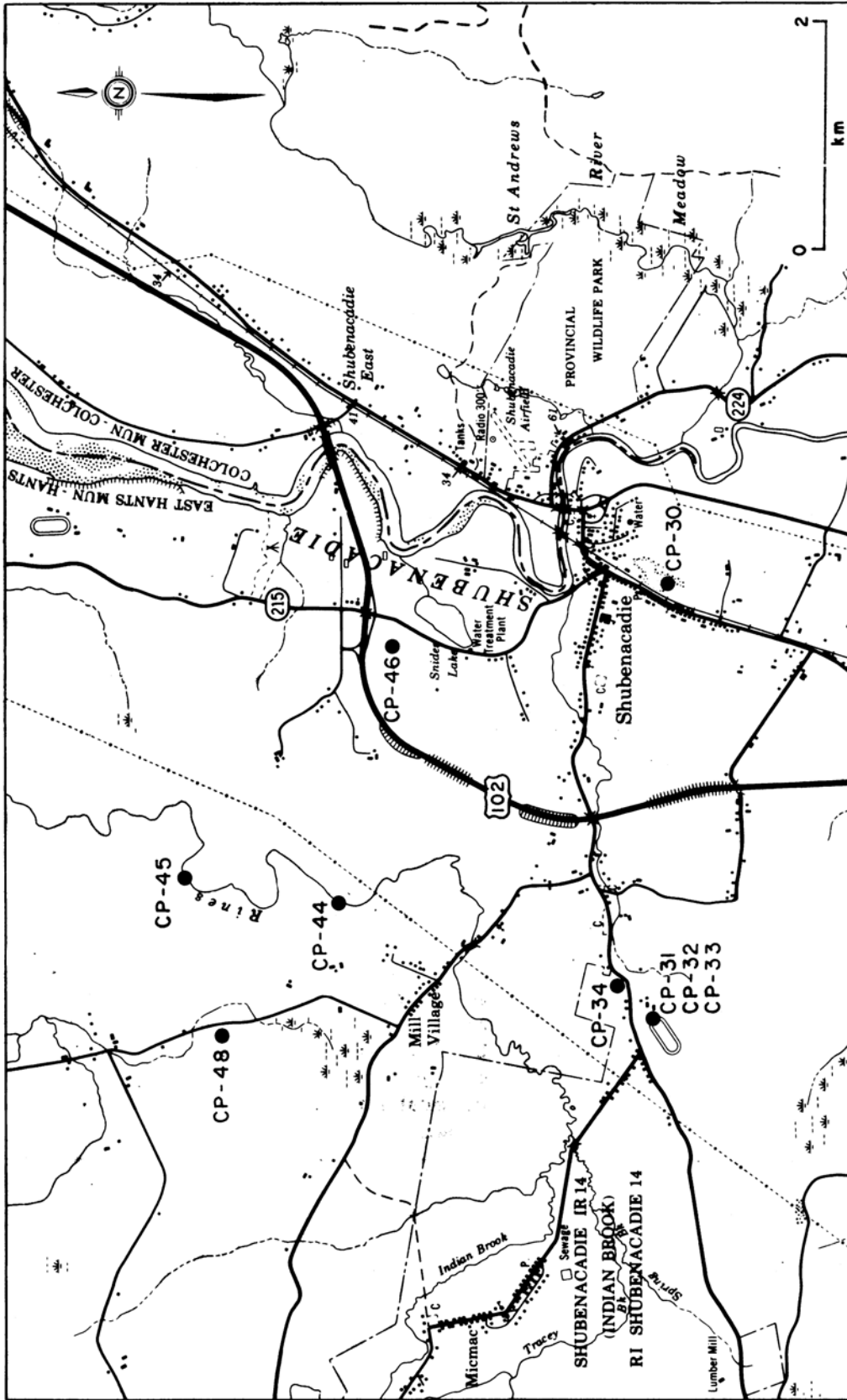


Figure 41. Location map for samples CP-30-34, 44-46, 48 (Shubenacadie)

Ref. Map II-E-3

HANTS COUNTY**Sample Number**

CP-31

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** On the property of Dr. Ross Ainslie, approximately 4 km west of Shubenacadie, on the southern side of the road to Mill Village (Fig. 41).**UTM:** 463930 E
4992060 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** 30 cm of mottled reddish-brown clay grading down into gravelly clay.**ATTITUDE OF BEDDING:** Essentially horizontal**SAMPLE INTERVAL:** Vertical 30 cm channel sample**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Greyish-orange, noncalcareous clay containing some stones. Very good workability. Highly plastic. Water of plasticity 25.6%. Safe drying. Air shrinkage 6.0%. Modulus of rupture 215 p.s.i. Benzidine test negative.**P.C.E.:** 4**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
05	3.38	10.62	Moderate reddish orange	Soft to hard
04	5.53	7.36	Dark moderate reddish orange	Hard
02	8.66	3.31	Moderate reddish brown	Steel hard

REMARKS: Appears to cover an extensive area**POTENTIAL USES:** Earthenware and artware

HANTS COUNTY**Sample Number**

CP-32

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** On the property of Dr. Ross Ainslie approximately 4 km west of Shubenacadie, on the southern side of the road to Mill Village (Fig 41).**UTM:** 463930 E
4992060 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** Mottled reddish-grey clay exhibiting iron carbonate stains. The clay unit is 91 cm thick. Weathered surfaces are commonly light grey to brown in colour.**ATTITUDE OF BEDDING:** Essentially horizontal**SAMPLE INTERVAL:** Channel sample from the top 30 cm of clay**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Grey and brown (moderate yellowish brown after grinding and mixing), noncalcareous clay. Very good workability. Very plastic. Water of plasticity 37.6%. Good extrudability. Safe drying. Air shrinkage 7.4%. Modulus of rupture 306 p.s.i. Benzidine test negative.**P.C.E.:** 5-6 (bloated)**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
05	7.83	1.73	Moderate reddish brown	Steel hard
04	10.62	0.16	Moderate reddish brown	Steel hard
02	6.83	0.04	Moderate reddish brown	Steel hard

POTENTIAL USES: Earthenware, artware and structural products .

HANTS COUNTY**Sample Number**

CP-33

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** On the property of Dr. Ross Ainslie, approximately 4 km west of Shubenacadie, on the southern side of the road to Mill Village (Fig. 41).**UTM:** 463930 E
4992060 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** There are two distinguishable horizons of clay at this location. Outcropping at the surface is a light grey clay with a thickness of 7 cm. It overlies 45 cm of mottled reddish-brown clay.**ATTITUDE OF BEDDING:** Essentially horizontal**SAMPLE INTERVAL:** Channel sample across top 30 cm of thickness**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Greyish-orange, noncalcareous, soily clay. Good workability. Poorly plastic. Water of plasticity 28.0%. Safe drying. Air shrinkage 5.9%. Modulus of rupture 178 p.s.i. Benzidine test negative.**P.C.E. :** 13**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	5.65	8.82	Dark moderate reddish orange	Hard
1	7.09	6.80	Moderate reddish brown	Hard
6	10.27	1.91	Dark reddish brown	Steel hard

POTENTIAL USES: None

HANTS COUNTY**Sample Number**

CP-34

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** Approximately 3.2 km west of Shubenacadie on the northern side of the road to Mill Village (Fig. 41).**UTM:** 464220 E
4992340 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** Light to medium grey clay. The length of the exposure is 9 m with a width of 90 cm and thickness in excess of 30 cm.**ATTITUDE OF BEDDING:** Essentially horizontal**SAMPLE INTERVAL:** 30 cm channel sample**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Pale yellowish-brown, noncalcareous, soily clay. Fair workability. Poorly plastic. Water of plasticity 22.4%. Safe drying. Air shrinkage 5.3%. Modulus of rupture 142 p.s.i. Benzidine test faint positive.**P.C.E.:** 6+**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
05	3.00	8.52	Moderate reddish orange	Hard
04	4.04	7.09	Moderate reddish orange	Hard to very hard
02	5.64	4.65	Moderate reddish brown	Steel hard

POTENTIAL USES: Common and face brick

HANTS COUNTY

Sample Number

CP-36

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: L. E. Shaw Ltd. quarry, about 30 m east of the Milford Station school (Fig. 40).

UTM: 465580 E
4987610 N

GEOLOGICAL UNIT: Windsor Group, Mississippian age

DESCRIPTION: Reddish-brown shale which becomes greyish-blue when weathered. Massive to thinly bedded, with bedding changing abruptly laterally. The shale is friable in place and has an exposed thickness of 6 m.

ATTITUDE OF BEDDING: 250° 110 ° NE

SAMPLE INTERVAL: Channel sample across lower 1 .8 m of thickness

TYPE OF MATERIAL: Shale

UNFIRED CHARACTERISTICS: Dark reddish-brown, highly calcareous shale. Very poor workability. Poorly plastic. Water of plasticity 20.4%. Safe drying. Air shrinkage 3.8. Benzidine test negative.

P.C.E.: 3+

FIRED CHARACTERISTICS:

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	2.85	8.60	Moderate reddish brown	Very hard
1	3.83	7.48	Moderate reddish brown	Very hard
3	4.85	4.46	Moderate reddish brown	Very hard

POTENTIAL USES: Not suitable if used by itself. At present it is being used along with red plastic clay from Lantz in the production of brick at L. E. Shaw Ltd. in Lantz.

HANTS COUNTY

Sample Number
CP-37

TOPOGRAPHICAL SHEET: 11E/04

LOCATION: Grumbley Brook, approximately 1.6 km west of MacPhees Corner . The exposure is in the Brook, 380 m south of the bridge, which is on the road from MacPhees Corner to Roulston Corner across Grumbley Brook, (Fig. 42).

UTM: 456230 E
4995530 N

GEOLOGICAL UNIT: Pleistocene clay, Quaternary age

DESCRIPTION: There are two distinguishable clay horizons, a 10 cm layer of brown clay overlying grey clay of the same thickness. The outcrop extends for 3 m along Grumbley Brook.

ATTITUDE OF BEDDING: Essentially horizontal**SAMPLE INTERVAL:** Channel sample across both clay horizons**TYPE OF MATERIAL:** Clay

UNFIRED CHARACTERISTICS: Light brown, noncalcareous, silty clay. Very poor workability. Poorly plastic. Water of plasticity 28.0%. Safe drying. Air shrinkage 4.0%. Benzidine test negative.

P.C.E.: 13**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	2.60	16.85	Pale reddish brown	Soft
1	1.74	17.42	Pale reddish brown	Soft
6	4.84	12.32	Pale reddish brown	Hard

POTENTIAL USES: None

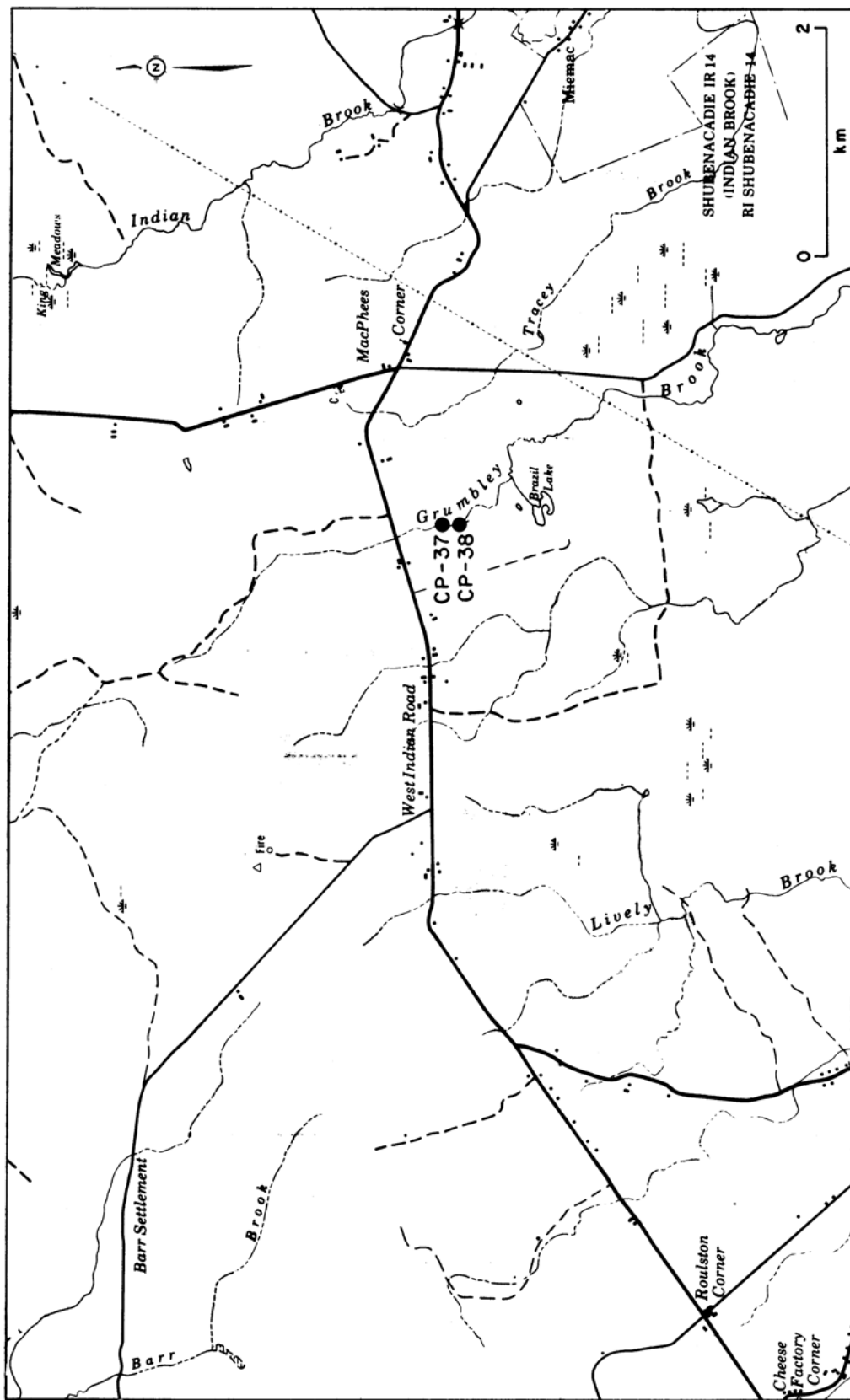


Figure 42. Location map for samples CP-37, 38 (MacPhees Corner)

Ref. Map II-E-4

HANTS COUNTY**Sample Number**

CP-38

TOPOGRAPHICAL SHEET: 11E/04

LOCATION: Grumbley Brook, approximately 1.6 km west of MacPhees Corner. The exposure, along the Brook, is 508 m south of the bridge, which is on the road from MacPhees Corner to Roulston Corner across Grumbley Brook (Fig. 42).

UTM: 456200 E
4995400 N

GEOLOGICAL UNIT: Pleistocene clay, Quaternary age

DESCRIPTION: A layer of reddish-brown clay overlying 30 cm of bluish-grey clay showing iron carbonate stains.

SAMPLE INTERVAL: Channel sample across 30 cm of bluish-grey clay.**TYPE OF MATERIAL:** Clay

UNFIRED CHARACTERISTICS: Light grey, highly calcareous clay containing minor silty material. Fair workability. Fairly plastic. Water of plasticity 18.4%. Safe drying. Air shrinkage 5.1%. Modulus of rupture 231 p.s.i. Benzidine test faint positive.

P.C.E.: 7-8**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	1.06	9.80	Pale reddish brown	Hard
1	1.10	8.82	Pale reddish brown	Hard
6	5.09	1.41	Greyish brown	Steel hard

REMARKS: Scumming at cone 02. Bloated on bottom at cone 6.**POTENTIAL USES:** None

HANTS COUNTY**Sample Number**

CP-39

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** An exposure approximately 27 m south of Route 14 in Barneys Brook, northwest of Milford Station (Fig. 40).**UTM:** 462910 E
4988730 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** A layer of reddish-brown clay, 15 cm thick.**SAMPLE INTERVAL:** 15 cm channel sample**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Moderate reddish-brown, noncalcareous clay containing some stones. Good workability. Plastic. Water of plasticity 23.6%. Safe drying. Air shrinkage 7.3%. Modulus of rupture 231 p.s.i. Benzidine test negative.**P.C.E.:** 4**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
05	2.88	9.60	Moderate reddish brown	Hard
04	4.85	6.49	Moderate reddish brown	Very hard
02	6.31	3.76	Dark reddish brown	Steel hard

POTENTIAL USES: Suitable for structural products

HANTS COUNTY

Sample Number
CP-40

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: An exposure approximately 630 m south of Route 14 in Barneys Brook, northwest of Milford Station (Fig. 40).

UTM: 462920 E
4988190 N

GEOLOGICAL UNIT: Pleistocene clay, Quaternary age

DESCRIPTION: Reddish-brown clay containing grit, carbonaceous material, and iron carbonates. The exposure is 46 cm wide, 20 cm thick and extends for 3 m along Barneys Brook. The clay grades down into sandy clay.

SAMPLE INTERVAL: 20 cm channel sample

TYPE OF MATERIAL: Clay

UNFIRED CHARACTERISTICS: Pale yellowish-brown, noncalcareous clay containing soil material. Fair workability. Poorly plastic. Water of plasticity 26.0%. Safe drying. Air shrinkage 6.6%. Modulus of rupture 199 p.s.i. Benzidine test negative.

P.C.E.: 10

FIRED CHARACTERISTICS:

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	4.82	9.59	Moderate reddish brown	Hard
1	5.01	8.53	Moderate reddish brown	Very hard
6	7.65	4.23	Dark moderate red	Steel hard

POTENTIAL USES: None

HANTS COUNTY**Sample Number**

CP-41

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** An exposure about 968 m south of Route 14, in the stream bed of Barneys Brook, northwest of Milford Station (Fig. 40).**UTM:** 462940 E
4987850 N**GEOLOGICAL UNIT:** Pleistocene clay, Quaternary age**DESCRIPTION:** Greyish-brown clay containing organic material. The exposure measures about 91 cm by 60 cm and has a thickness of 15 cm. Below this it contains alot of grit and stones.**ATTITUDE OF BEDDING:** Essentially horizontal**SAMPLE INTERVAL:** 15 cm channel sample**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Pale yellowish-brown, noncalcareous clay. Fair workability. Plastic. Water of plasticity 23.3%. Safe drying. Air shrinkage 5.7%. Modulus of rupture 220 p.s.i. Benzidine test negative.**P.C.E.:** 11**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	2.30	9.69	Light reddish brown	Hard
1	8.16	10.06	Light reddish brown	Hard
6	5.81	3.89	Moderate brown	Steel hard

POTENTIAL USES: None

HANTS COUNTY**Sample Number**

CP-42

TOPOGRAPHICAL SHEET: 11E/03**LOCATION:** The occurrence is about 1 km south of Route 14 along Barneys Brook, approximately 3.2 km west of Milford Station (Fig. 40).**UTM:** 462940 E
4987760 N**GEOLOGICAL UNIT:** Clay, Quaternary age**DESCRIPTION:** Reddish-brown clay containing some stones. The outcrop of clay extends over a length of 1.8 m, has a width of 91 cm and thickness in excess of 45 cm.**SAMPLE INTERVAL:** 45 cm channel sample**TYPE OF MATERIAL:** Clay**UNFIRED CHARACTERISTICS:** Moderate brown, noncalcareous clay containing a few stones. Very good workability. Very plastic. Water of plasticity 28.0%. Safe drying. Air shrinkage 7.4%. Modulus of rupture 220 p.s.i. Benzidine test negative.**P.C.E.:** 6+ (some bloating at cone 3)**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	5.57	6.50	Pale reddish brown	Very hard
04	7.86	2.15	Dark moderate reddish brown	Steel hard
02	7.28	0.06	Dark reddish brown	Steel hard

POTENTIAL USES: Artware, earthenware and structural products

HANTS COUNTY**Sample Number**

CP-43

TOPOGRAPHICAL SHEET: 11E/O3

LOCATION: Exposure is on the property of Mr. Scothorn, north of Route 14 and west of Barneys Brook in a pasture about 305 rn east of Mr. Scothorn's barn (Fig. 40).

UTM: 462540 E
4988710 N

GEOLOGICAL UNIT: Clay, Quaternary age

DESCRIPTION: A 3 rn wide exposure of light brown clay which outcrops intermittently for a length of 46 m.

SAMPLE INTERVAL: Grab sample**TYPE OF MATERIAL:** Clay

UNFIRED CHARACTERISTICS: Light brown, noncalcareous, soily clay. Good workability. Plastic. Water of plasticity 29.2%. Safe drying. Air shrinkage 6.7%. Modulus of rupture 371 p.s.i. Benzidine test negative.

P.C.E.: 9**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
04	4.47	12.17	Moderate reddish brown	Hard
02	7.54	6.05	Moderate reddish brown	Very hard to steel hard
1	8.36	5.67	Moderate reddish brown	Steel hard

POTENTIAL USES: Structural products

HANTS COUNTY

Sample Number
CP-44

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: The exposure is found in the stream bed of Rines Brook, approximately 530 m north of the power lines which cross Rines Brook (Fig. 41).

UTM: 465050 E
4994960 N

GEOLOGICAL UNIT: Windsor Group, Mississippian age

DESCRIPTION: Dark grey shale, fine to medium bedded and micaceous. It outcrops continuously in the stream bed for about 54 m.

ATTITUDE OF BEDDING: 340° /07° SW

SAMPLE INTERVAL: Grab sample

TYPE OF MATERIAL: Shale

UNFIRED CHARACTERISTICS: Dark grey, noncalcareous shale. Fair workability. Very plastic. Water of plasticity 23.2%. Safe drying. Air shrinkage 5.3%. Modulus of rupture 280 p.s.i. Benzidine test negative.

P.C.E.: 3+

FIRED CHARACTERISTICS:

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	6.87	4.65	Moderate reddish brown	Steel hard
04	7.17	2.43	Dark reddish brown	Steel hard
02	6.85	1.51	Dark reddish brown	Steel hard

POTENTIAL USES: Structural products

HANTS COUNTY**Sample Number**

CP-45

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: Rines Brook, approximately 4.3 km northwest of Shubenacadie. The occurrence is about 2.3 km north of the power lines which cross Rines Brook (Fig. 41).

UTM: 465150 E
4996030 N

GEOLOGICAL UNIT: Windsor Group, Mississippian age

DESCRIPTION: Dark grey, medium bedded shale containing pyrite. The outcrop extends for about 61 m along Rines Brook.

ATTITUDE OF BEDDING: 280°/14° NE**SAMPLE INTERVAL:** Grab sample**TYPE OF MATERIAL:** Shale

UNFIRED CHARACTERISTICS: Medium grey, highly calcareous shale. Fair workability. Plastic. Water of plasticity 23.2%. Safe drying. Air shrinkage 3.8%. Modulus of rupture 65 p.s.i. Benzidine test negative. Dark scum on top after drying.

P.C.E.: 4-**FIRED CHARACTERISTICS**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
02	0.17	37.08	Off white	Very soft
1	Nil	37.05	Off white	Very soft
3	0.69	36.56	Off white	Very soft

POTENTIAL USES: None

HANTS COUNTY

Sample Number
CP-46

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: Exposure is approximately 300 m south of the Trans-Canada Highway 102 and 200 m west of Route 215 northwest of Shubenacadie (Fig. 41).

UTM: 467360 E
4994670 N

GEOLOGICAL UNIT: Clay, Quaternary age

DESCRIPTION: Mottled brownish-red to red clay which is sandy at depth. Upon weathering the clay becomes light grey. The occurrence is about 61 m long, 27 m wide and over 91 cm thick.

SAMPLE INTERVAL: Channel sample across the top 30 cm

TYPE OF MATERIAL: Clay

UNFIRED CHARACTERISTICS: Dark yellowish-orange, noncalcareous clay. Very good workability. Plastic. Safe drying. Air shrinkage 6.5%. Modulus of rupture 255 p.s.i. Benzidine test negative.

P.C.E.: 11

FIRED CHARACTERISTICS:

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	4.83	12.25	Moderate reddish orange	Hard
04	6.59	9.44	Moderate reddish orange	Very hard
02	9.83	3.67	Moderate reddish brown	Steel hard

POTENTIAL USES: Face brick, common brick, hollow tile, conduit and sewer pipe

HANTS COUNTY**Sample Number**

CP-48

TOPOGRAPHICAL SHEET: 11E/03

LOCATION: On the property of Ben Smith, North Salem road, approximately 1.6 km north of the intersection between the roads going to MacPhees Corner and North Salem. The clay was exposed by digging with a shovel about 305 m west of the road (Fig. 41).

UTM: 463610 E
4995760 N

GEOLOGICAL UNIT: Windsor Group, Mississippian age

DESCRIPTION: Mottled yellowish-brown to reddish-brown clay containing organic material and grit. Thickness of the clay is in excess of 21 cm.

SAMPLE INTERVAL: 21 cm channel sample.**TYPE OF MATERIAL:** Clay

UNFIRED CHARACTERISTICS: Grey and brown (light brown after grinding and mixing), noncalcareous clay. Very good workability. Very plastic. Water of plasticity 31.6%. Safe drying. Air shrinkage 7.3%. Modulus of rupture 255 p.s.i. Benzidine test negative.

P.C.E.: 8-9**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	5.03	10.71	Moderate reddish orange	Hard
04	6.61	9.23	Moderate reddish orange	Hard
02	9.01	3.22	Moderate reddish brown	Steel hard

REMARKS: It appears this clay may cover an extensive area and thus further investigation may be warranted.

POTENTIAL USES: Artware, common brick, face brick, hollow tile, conduit and sewer pipe.

HANTS COUNTY**Sample Number**

CP-49

TOPOGRAPHICAL SHEET: 11D/13

LOCATION: Clay was exposed by digging with a shovel in a swampy area about 137 m northwest of the Shubenacadie River, approximately 900 m northeast of Enfield (Fig. 43).

UTM: 458340 E
4976980 N

GEOLOGICAL UNIT: Clay, Quaternary age

DESCRIPTION: Yellowish-brown clay, 5 crn thick, with extensive iron carbonate stains. Underlying this is a reddish-brown clay containing some organic and carbonaceous material. It has a minimum thickness of 46 cm.

SAMPLE INTERVAL: Channel sample from the top 30 crn of the reddish-brown clay horizon

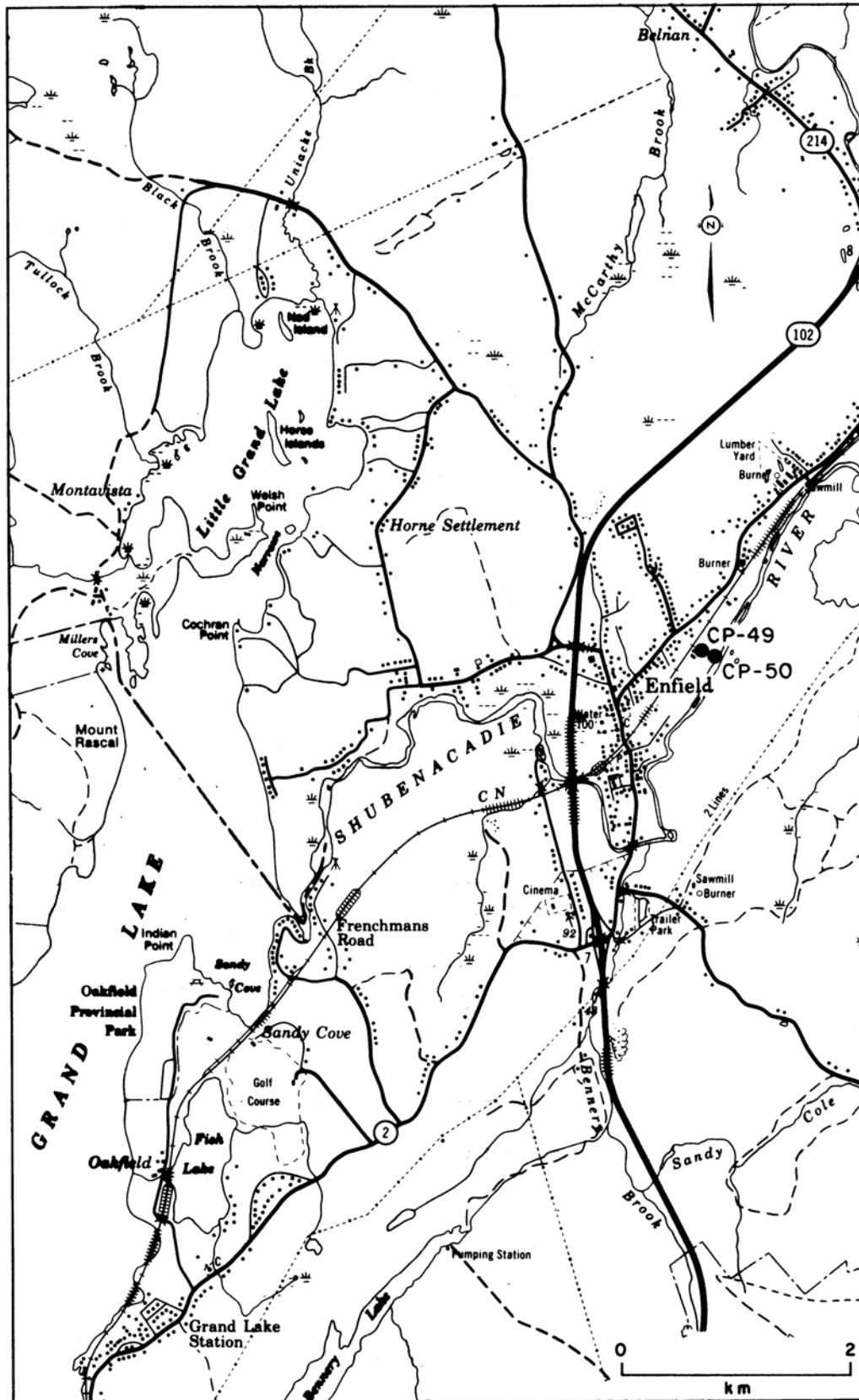
TYPE OF MATERIAL: Clay

UNFIRED CHARACTERISTICS: Light-brown, noncalcareous clay. Very good workability. Highly plastic. Water of plasticity 28.0%. Safe drying. Air shrinkage 7.8%. Modulus of rupture 285 p.s.i. Benzidine test negative.

P.C.E.: 9-**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	7.62	6.79	Moderate reddish orange	Steel hard
04	8.24	1.50	Moderate reddish brown	Steel hard
02	7.62	0.02	Dark moderate reddish brown	Steel hard

POTENTIAL USES: Structural products



Ref. Map 11-D-13

Figure 43. Location map for samples CP-49, 50 (Enfield)

HANTS COUNTY

Sample Number
CP-50

TOPOGRAPHICAL SHEET: 11D/13

LOCATION: The exposure is approximately 137 m south of sample CP-49, on the western side of the Shubenacadie River (Fig. 43).

UTM: 458460 E
4976880 N

GEOLOGICAL UNIT: Clay, Quaternary age

DESCRIPTION: Reddish-brown clay containing some organic and carbonaceous material. The thickness of the clay is in excess of 30 cm.

SAMPLE INTERVAL: 30 cm channel sample

TYPE OF MATERIAL: Clay

UNFIRED CHARACTERISTICS: Moderate reddish-orange, noncalcareous clay. Very good workability. Highly plastic. Water of plasticity 33.2%. Safe drying. Air shrinkage 8.1%. Modulus of rupture 216 p.s.i. Benzidine test negative.

P.C.E.: 11-12

FIRED CHARACTERISTICS:

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	6.65	8.09	Moderate reddish orange	Steel hard
04	9.09	2.46	Moderate reddish brown	Steel hard
02	10.79	0.02	Moderate reddish brown	Steel hard

POTENTIAL USES: Structural products

HANTS COUNTY**Sample Number**

CP-51

TOPOGRAPHICAL SHEET: 11D/14

LOCATION: L. E. Shaw Ltd. Brick and Tile Plant southeast of Highway 2, at Lantz. The pit is approximately 305 m southwest of the plant where L. E. Shaw presently have their quarry (Fig. 44).

UTM: 461820 E
4980350 N

GEOLOGICAL UNIT: Clay, Quaternary age

DESCRIPTION: Compact, reddish-brown clay. The sample was taken from the southeastern corner of the pit where the clay was exposed for a length and width of 9 m and a thickness greater than 4.5 m.

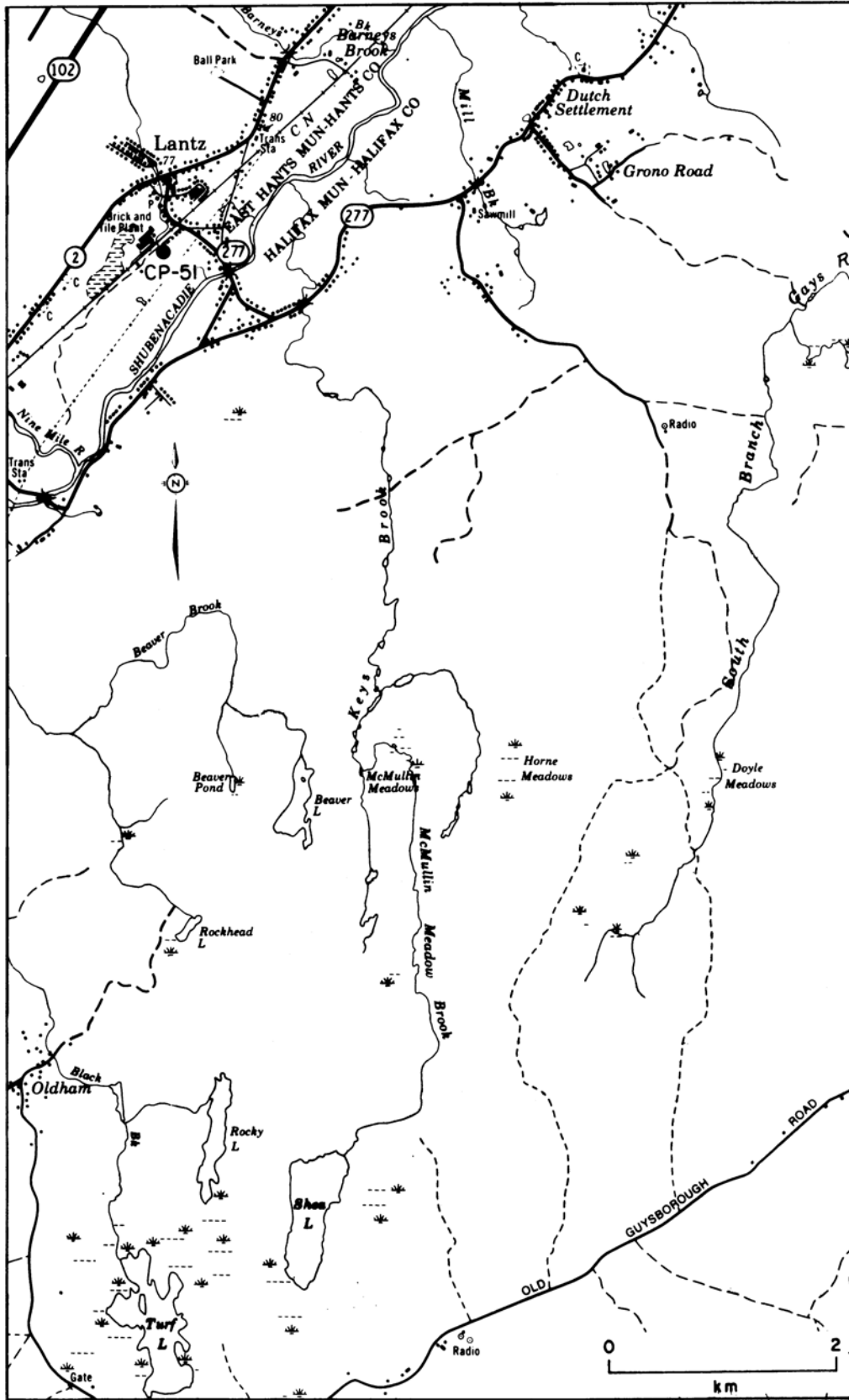
SAMPLE INTERVAL: Grab sample**TYPE OF MATERIAL:** Clay

UNFIRED CHARACTERISTICS: Pale reddish-brown, calcareous clay. Very good workability. Very plastic. Water of plasticity 28.0%. Safe drying. Air shrinkage 7.6%. Modulus of rupture 235 p.s.i. Benzidine test negative.

P.C.E.: 4-**FIRED CHARACTERISTICS:**

Cone No.	Fired Shrinkage %	Absorption %	Colour	Hardness
06	3.81	8.15	Light pale reddish brown	Very hard to steel hard
04	6.92	4.00	Pale reddish brown	Steel hard
02	8.24	0.33	Pale reddish brown	Steel hard

POTENTIAL USES: This material is presently being used in the manufacture of brick and tile.



Ref. Map II-D-14

Figure 44. Location map for sample CP-51 (Lantz)