NTS 83A AGGREGATE Ermineskin Indian Reserve 138 Indian Reserve 137 Tp 40 Tp 35 114° 00' Rg 28 Rg15 W4 112° 00' Rg 22 Published 2004 Copies of this map may be obtained from: Information Sales Alberta Geological Survey **Map 280** Telephone: (780) 422-3767 Web site: www.ags.gov.ab.ca Sand and Gravel Deposits with Aggregate Potential D C B A Red Deer, Alberta (NTS 83A) Geology compiled by: W.A.D. Edwards, H.D. Budney, T. Berezniuk and L. Butkovic 83 Scale 1:250 000 **WEUB** Projection: Universal Transverse Mercator, Zone 12

Datum: North American Datum, 1983





GRAVEL deposit: contains greater than 75% gravel. sandy GRAVEL deposit: contains 50% to 75% gravel. gravelly SAND deposit: contains 25% to 50% gravel. SAND deposit: contains less than 25% gravel. UNKNOWN deposit: amount of gravel unknown.

clean deposit: contains less than 3% silt and clay. dirty deposit: contains 3% to 10% silt and clay. very dirty deposit: contains greater than 10% silt and clay. unknown: contains unknown percentage of mixed silt and clay.

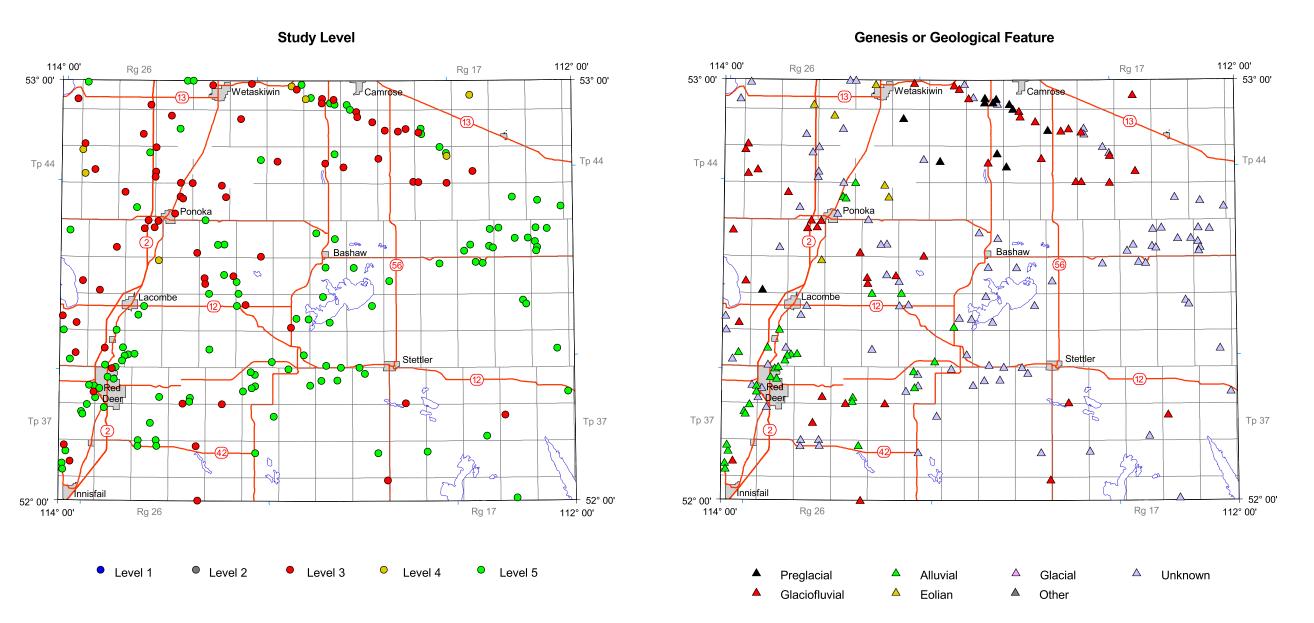
## **BASEMAP LEGEND**



+ 450000m.E

This is a common map legend. Not all units may be present on this map.

UTM, zone 12 grid



## **Study Level Definitions:**

Level 1 Aggregate reserves confirmed by grid testing and sampling.

Level 2 Aggregate resources confirmed by multiple test holes and sampling.

Level 3 Sand and/or gravel confirmed by Alberta Geological Survey site investigation and limited sampling and testing.

Level 4 Sand and/or gravel areas assumed by Alberta Geological Survey investigation of associated sites, remote sensing and other sources of information.

Level 5 Potential sand and/or gravel areas identified from remote sensing and other sources of information without Alberta Geological Survey site investigation.

Allong, A.F. (1967): Sedimentation and stratigraphy of the Saskatchewan gravels and sands in central and southern Alberta; M.Sc. thesis, University of Wisconsin, Madison, Wisconsin, 130 p.

Edwards, W.A.D. and Scafe, D. (1996): Mapping and resource evaluation of the Tertiary and preglacial sand and gravel formations of Alberta; Alberta Energy and Utilities Board, EUB/AGS, OFR 1994-06, 241 p.

Holter, M.E. (1975): Gravel resources of the Red Deer area; Alberta Research Council, ESR 75-03, 54 p.

Sham, P. (1980): Aggregate resources of the Bearhills Lake map area, NTS 83A/13; Alberta Research Council, Map A83A13, scale 1:50 000.

Sham, P. (1980): Aggregate resources of the Chain Lakes map area, NTS 83A/11; Alberta Research Council, Map A83A11, scale 1:50 000. Sham, P. (1980): Aggregate resources of the Ponoka map area, NTS 83A/12; Alberta Research Council, Map A83A12, scale 1:50 000.

Sham, P. (1980): Aggregate resources of the Wetaskiwin map area, NTS 83A/14; Alberta Research Council, Map A83A14, scale 1:50 000.

Sham, P. (1981): Aggregate resources of the Red Deer map area, NTS 83A; Alberta Research Council, Map A83A, scale 1:250 000.

Sham, P. (1986): Aggregate resources of the Ferintosh map area, NTS 83A/15; Alberta Research Council, Map A83A15, scale 1:50 000. Sham, P. and Edwards, W.A.D. (1980): Aggregate resources of the Bittern Lake map area, NTS 83H/03; Alberta Research Council, Map A83H3,

Stalker, A. MacS. (1960): Surficial geology of the Red Deer - Stettler map area, Alberta; Geological Survey of Canada, Memoir 306, 140 p.

Acknowledgement: GIS/Database/Cartography by: M.C. Price, D.K. Chao, B.E. Schmidtke (Livingstone Geological Services), Z.A. Amer and N.L. Blundon

Digital base map provided by:

Spatial Data Warehouse

Disclaimer:

The Alberta Geological Survey and its employees and contractors make no warranty, guarantee or representation, express or implied, or assume any legal liability regarding the correctness, accuracy, completeness, or reliability of this publication. When using information from this publication in other publications or presentations, due acknowledgement should be given to the Alberta Energy and Utilities Board/Alberta Geological Survey.



Alberta Energy and Utilities Board