

Energy, Mines and Resources Canada / Énergie, Mines et Ressources Canada

THE NATIONAL ATLAS OF CANADA 5th EDITION

CANADA

PULP AND PAPER MILLS

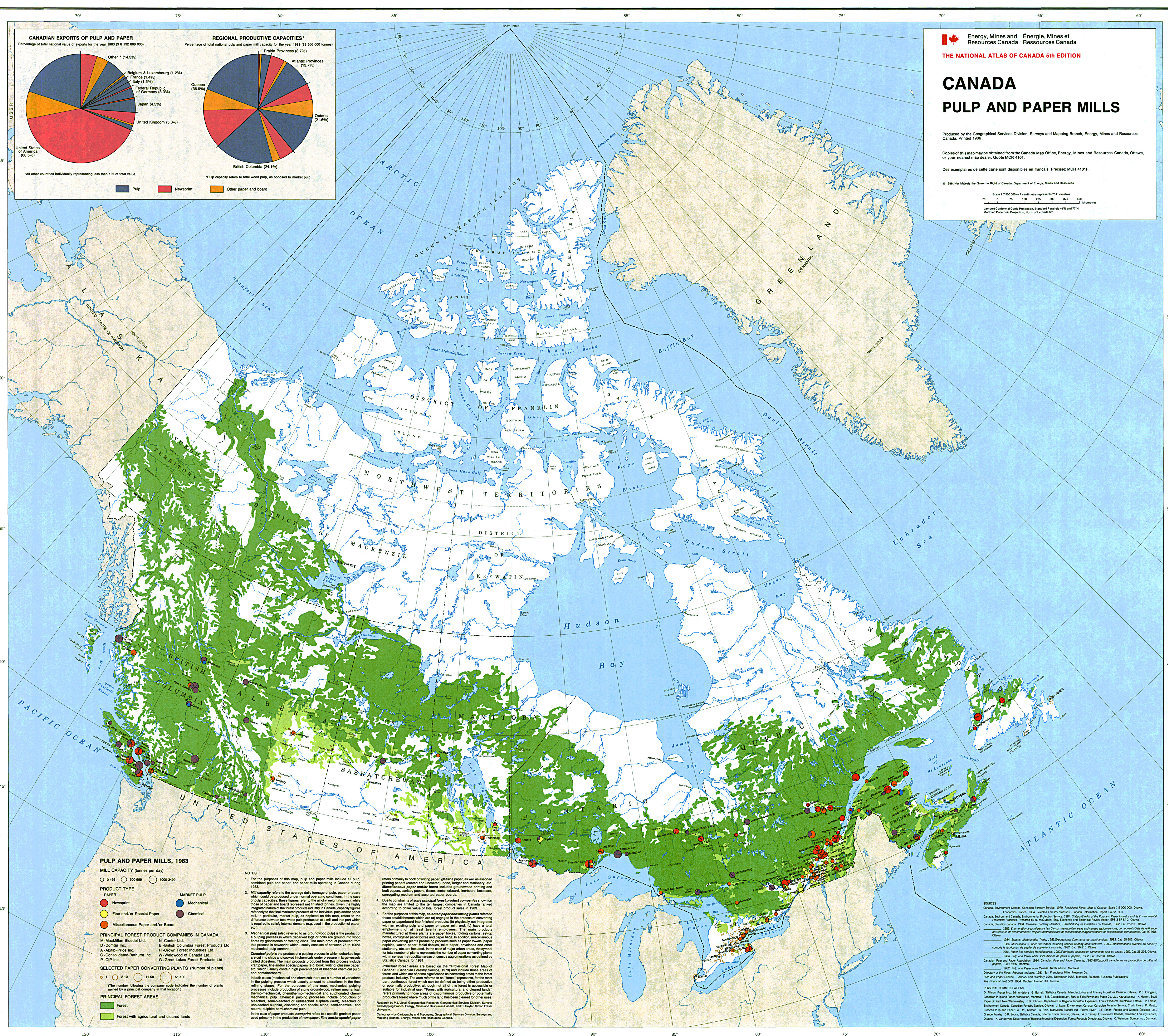
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Scale 1:7 500 000 or 1 centimetre represents 75 kilometres
0 75 150 225 300 375 450 kilometres
Lambert Conformal Conic Projection, Standard Parallels 49°N and 77°N
Modified Polyconic Projection, Null at Latitude 80°



PULP AND PAPER MILLS, 1983

MILL CAPACITY (tonnes per day)

0-499 500-999 1000-2499

PRODUCT TYPE

Newsprint Mechanical Pulp
Fine and/or Special Paper Chemical
Miscellaneous Paper and/or Board

PRINCIPAL FOREST PRODUCT COMPANIES IN CANADA

M-MacMillan Bloedel Ltd. N-Canfor Ltd.
D-Dorrier Inc. B-British Columbia Forest Products Ltd.
A-Albion-Pine Inc. R-Crown Forest Industries Ltd.
C-Consolidated-Bathurst Inc. W-Welwood of Canada Ltd.
P-CIP Inc. G-Great Lakes Forest Products Ltd.

SELECTED PAPER CONVERTING PLANTS (Number of plants)

1 2-10 11-50 51-100

(The number following the company code indicates the number of plants owned by a principal company in that location.)

PRINCIPAL FOREST AREAS

Forest
Forest with agricultural and cleared lands

NOTES

1. For the purposes of this map, pulp and paper mills include all pulp, combined pulp and paper, and paper mills operating in Canada during 1983.

2. Mill capacity refers to the average daily tonnage of pulp, paper or board which could be produced under normal operating conditions. In the case of pulp capacities, these figures refer to the air-dry weight (tonnes), while those of paper and board represent net finished tonnes. Given the highly integrated nature of the forest products industry in Canada, capacity figures refer only to the final marketed products of the individual pulp and/or paper mill. In particular, market pulp, as depicted on this map, refers to the difference between total wood pulp production and that part which is required to satisfy internal demand (e.g. used in the production of paper, etc.).

3. Mechanical pulp (also referred to as groundwood pulp) is the product of a pulping process in which debarked logs or bolts are ground into wood chips by grinders or rotating discs. The main product produced from this process is newsprint which usually consists of between 75 to 100% mechanical pulp content. Chemical pulp is the product of a pulping process in which debarked logs are cut into chips and cooked in chemical solutions in large vessels called digesters. The main products produced from this process include kraft paper, fine and/or special paper (e.g. book, writing, glassine paper, etc. which usually contain high percentages of bleached chemical pulp) and containerboard.

In both cases (mechanical and chemical) there are a number of variations in the pulping process which usually amount to alterations in the final refining stages. For the purposes of this map, mechanical and thermochemical processes include production of stone groundwood, refined mechanical, thermochemical, chemomechanical and sulfonated chemical mechanical pulp. Chemical pulping processes include production of bleached, semi-bleached or unbleached sulphate (kraft), bleached or unbleached sulphite, dissolving and special alpha, semi-chemical, and neutral sulphite semi-chemical pulp.

In the case of paper products, newsprint refers to a specific grade of paper used primarily in the production of newspaper. Fine and/or special paper refers primarily to book or writing paper, glassine paper, as well as assorted printing papers (coated and uncoated), bond, ledger and stationery, etc. Miscellaneous paper and/or board includes groundwood printing and kraft papers, sanitary papers, tissue, containerboard, linerboard, boardstock, corrugating medium and assorted paper boards.

4. Due to constraints of scale principal forest product companies shown on the map are limited to the ten largest companies in Canada ranked according to dollar value of total forest product sales in 1983.

5. For the purposes of this map, selected paper converting plants refer to those establishments which are (a) engaged in the process of converting paper or paperboard into finished products; (b) physically not integrated with an existing pulp and paper or paper mill; and, (c) have a total employment of at least twenty employees. The main products manufactured at these plants are paper boxes, folding cartons, sacks, books, corrugated paper boxes and paper bags. In addition, miscellaneous paper converting plants producing products such as paper towels, paper napkins, waxed paper, facial tissues, toilet paper, envelope and other stationery, etc. are included. In the case of major urban areas, the symbol for total number of plants represents the number of paper converting plants within certain metropolitan areas or census agglomerations as defined by Statistics Canada for 1981.

6. Principal forest areas are based on the "Provisional Forest Map of Canada" (Canadian Forestry Service, 1979) and include those areas of forest land which are of prime significance as harvesting areas to the forest products industry. The area referred to as "forest" represents, for the most part, continuous forest which can be defined as being either productive or potentially productive, although not all of this forest is accessible or suitable for industrial use. "Forest with agricultural and cleared lands" refers primarily to those areas of discontinuous productive or potentially productive forest where much of the land has been cleared for other uses.

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