INDEX TO THE

MINNESOTA REGIONAL COPPER-NICKEL STUDY

Prepared by:

Susan M. Tertell
Environmental Conservation Library
Minneapolis Public Library
and Information Center
300 Nicollet Mall
Minneapolis, Minnesota 55401

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INTRODUCTION

The Minnesota Regional Copper-Nickel Study is a comprehensive examination of the potential cumulative environmental, social and economic impacts of copper-nickel development in northeastern Minnesota. It was conducted from 1976 through 1978 by a special study team assembled by the Minnesota Environmental Quality Board. Funding for the study was provided by the Legislative Commission on Minnesota Resources.

This index is intended to be a guide to this wide-ranging and detailed study, which encompasses approximately 3,790 pages in 5 volumes totalling 36 chapters. The index is detailed and comprehensive. Efforts have been made to standardize terminology where this is possible, and there are liberal cross-references. The reader also is encouraged to make use of the tables of contents included in each of the chapters, since these show more readily the hierarchical organization of the subject areas covered in the study.

Each chapter of volumes 2-5 was published separately, with separate paging. For this reason each index entry refers to both volume and chapter, as well as page.

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ABBREVIATIONS

ACE allowable cut effect

ACGIH American Conference of Governmental Industrial Hygienists

ADT average daily traffic

ANFO Ammonium nitrate fuel oil

BLM Bureau of Land Management

CDM Climatological Dispersion Model

CEU copper equivalent units

CIPEC Intergovernmental Council of Copper Exporting Countries

COMEX New York Commodity Exchange

CPOM coarse particles of organic matter

CSAH County State Aid Highways

CSI Calcite saturation index

CTC centralized traffic control

dBA decibels, adjusted

dcfror discounted cash flow rate of return

DMA Dimethylaniline

DO dissolved oxygen

EDS X-ray spectroscopy

ELA Experimental Lakes Area (in northwestern Ontario)

FPOM fine particles of organic matter

Hz hertz

KAX Potassium amyl xanthate

KVA Kilovolt-ampere

LHD units Load-haul-dump units

LME London Metal Exchange

M mesh (refers to Tyler mesh size)

MCL Maximum contaminant level

MDH Minnesota Department of Health

MDNR Minnesota Department of Natural Resources

MGS Minnesota Geological Survey

MIBC methyl isobutyl carbinol

MRRC Minnesota Mineral Resources Research Center

MSHA Mine Safety and Health Administration

MTPY metric tons per year

NAA neutron activation analysis

NCFES North Central Forest Experiment Station

NIOSH National Institute of Occupational Safety and Health

NSPS new source performance standards

ORTRAN Superior Coal Transshipment Facility

PSD Prevention of Significant Deterioration

RARE Roadless area review and evaluation

RIM Recreation Information Management

RNA Research Natural Area

RQD rock quality designation

SAF Society of American Foresters

SCORP State Comprehensive Outdoor Recreation Plan

SCS Soil Conservation Service

SIP State implementation plan

SKRSA South Kawishiwi River Special Area

SNF Superior National Forest

TBRC top-blown rotary converter

TDS total dissolved solids

TEM Texas Episodic Model

TEM transmission electron microscopy

TH trunk highways

TLV threshold limit value

TOC total organic carbon

TSI trophic state index

TSP total suspended particulates

TSS total suspended solids

UPL ultimate pit limit