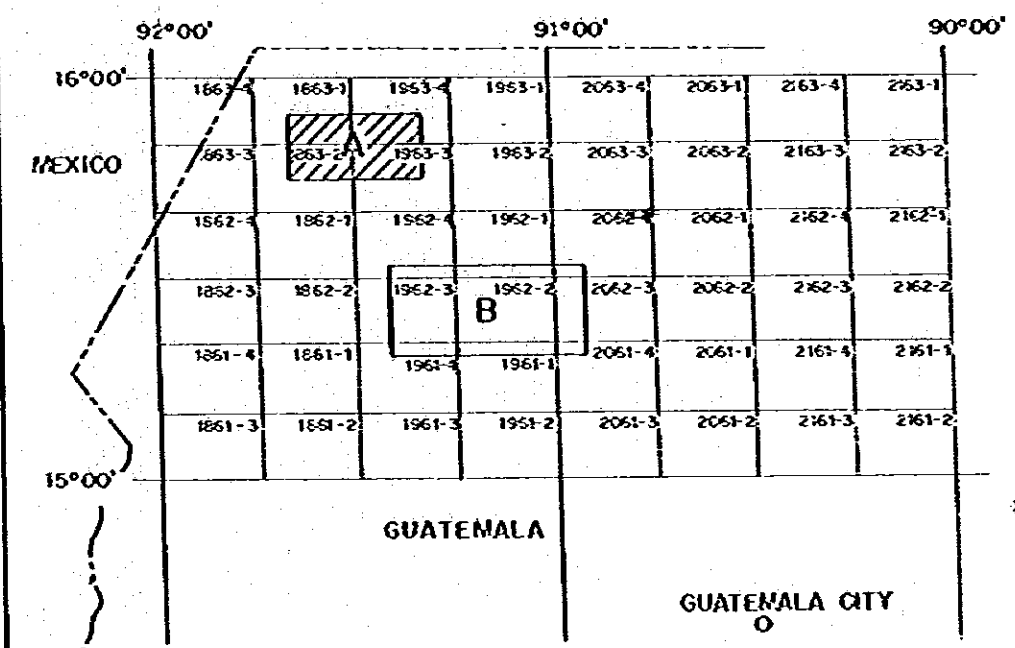


GEOLOGICAL SURVEY  
OF CUCHUMATANES AREA  
WESTERN GUATEMALA  
PHASE III  
GEOLOGICAL MAP  
AREA - A

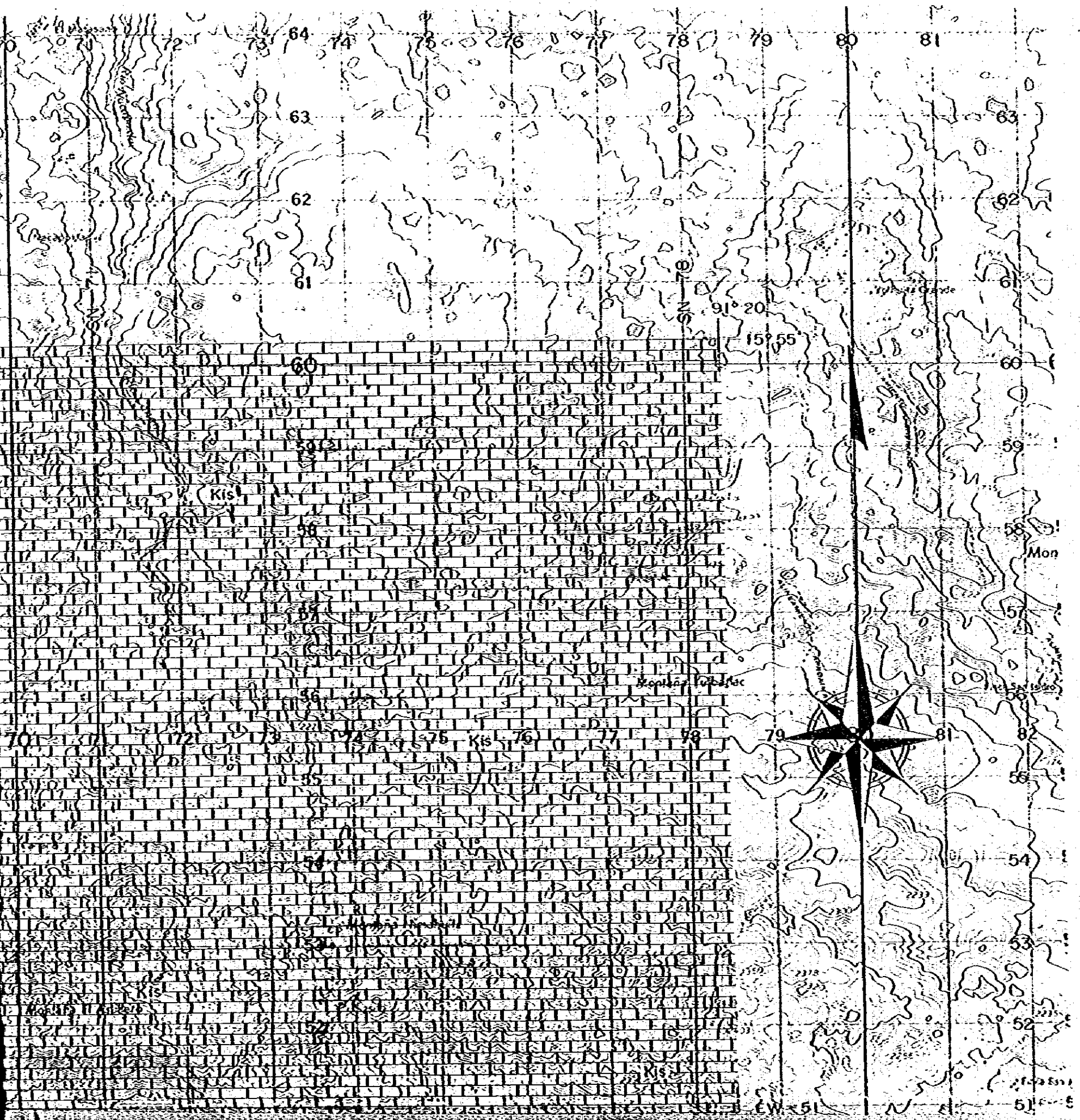
SCALE 1:50,000

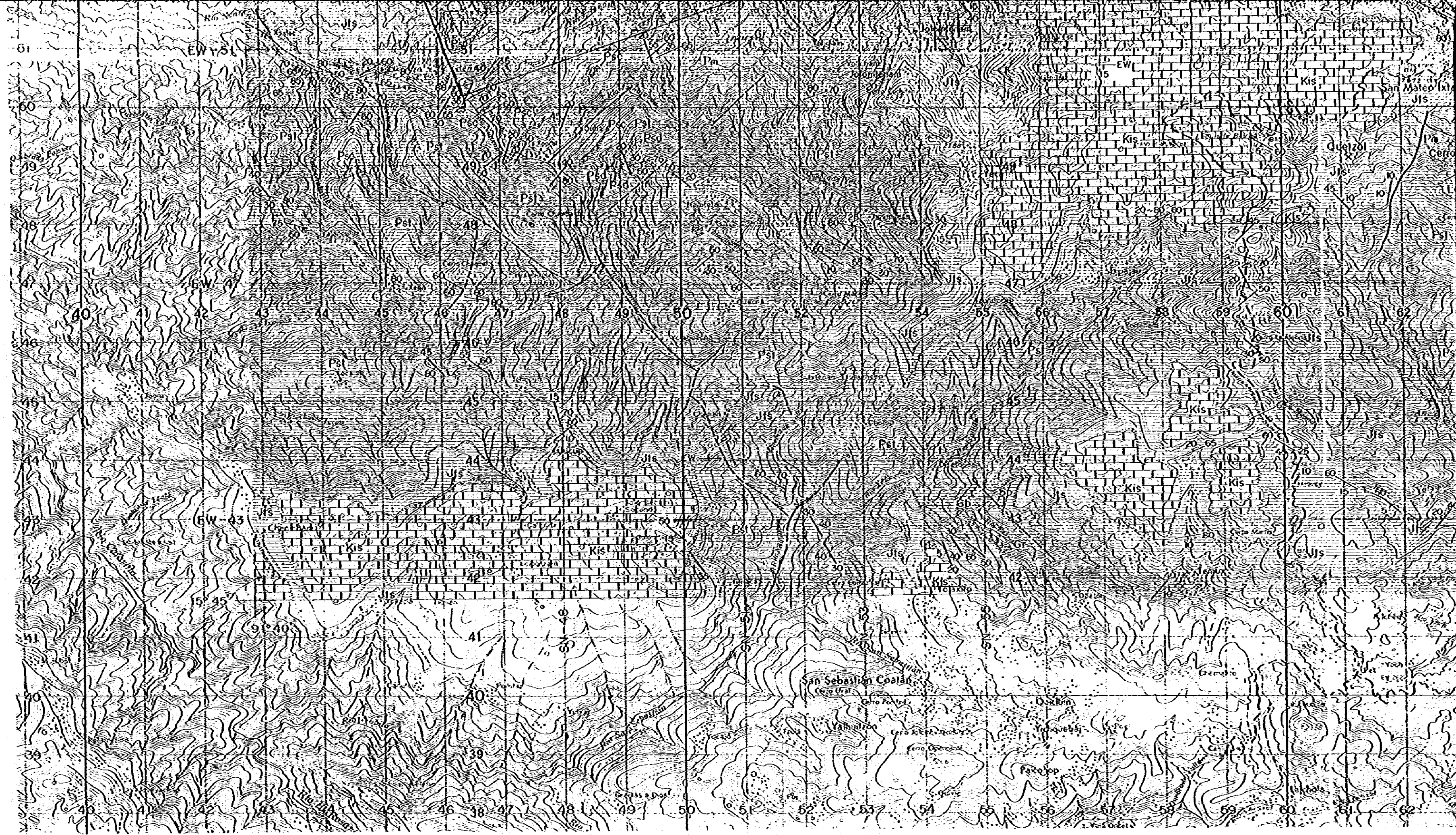


2062-3 Number of  
1:50,000 Top Map

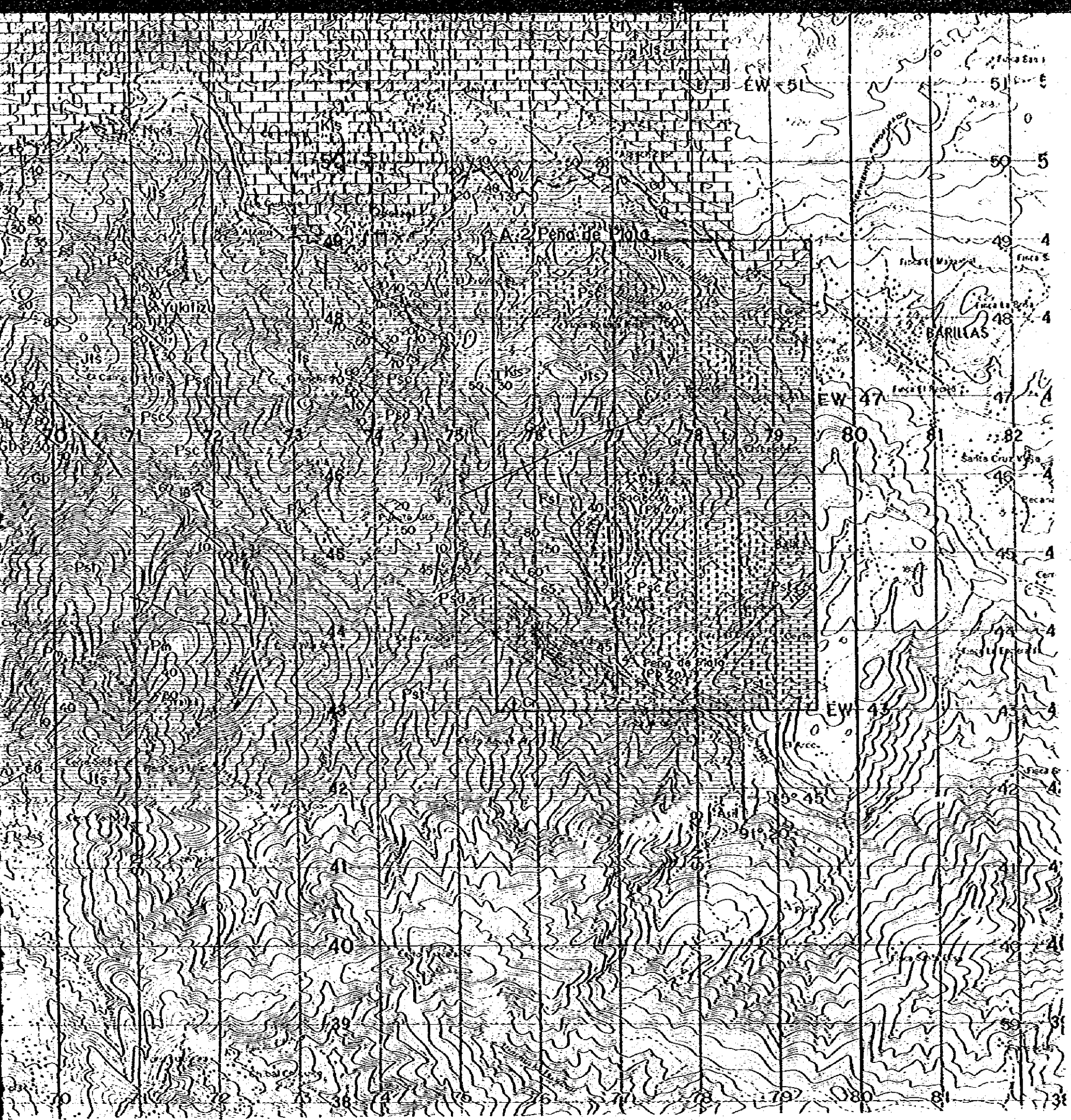
METAL MINING AGENCY OF JAPAN  
JAPAN INTERNATIONAL CO-OPERATION AGENCY  
GOVERNMENT OF JAPAN  
COLABORATION WITH  
DIRECCION GENERAL DE MINERIA  
E HIDROCARBUROS DE GUATEMALA

February 1979









LEGEND

- |                 |   |  |                                 |
|-----------------|---|--|---------------------------------|
| CENOZOIC        | QUATERNARY                                    | Alluvium   |                                 |
|                 |   | Volcanic ash, pumice & welded tuff   |                                 |
|                 |   | Travertine or calcareous sinter  |                                 |
| MESOZOIC        | CRETACEOUS                                    |  |                                 |
|                 | IXCOY FORMATION                               | Limestone with a minor amount of dolomite  |                                 |
|                 | LOWER CRETACEOUS ~ UPPER TRIASSIC(?)          |  |                                 |
|                 | TODOS SANTOS FORMATION                        | Terrestrial red beds; shale, sandstone, conglomerate & minor interlayer of limestone (Jts) |                                 |
| PALEOZOIC       | PERMIAN & PRE-PERMIAN                         |  |                                 |
|                 | SANTA ROSA GROUP                              |  |                                 |
|                 |   | Slate, sandstone, dolomite & conglomerate locally including a minor amount of schists      |                                 |
|                 |   | Limestone with local intercalation of dolomite   |                                 |
|                 |   | Diabase including basic volcanics  |                                 |
|                 |   | Schist with a minor amount of volcanics  |                                 |
| INTRUSIVE ROCKS |   |  |                                 |
|                 | Granitic rocks & their hypabyssal equivalents |  |                                 |
|                 | Serpentinized peridotite & serpentinite       |  |                                 |
|                 | Dykes   |  |                                 |
|                 | Geological boundary                           |  | Fossil locality                 |
|                 | Bedding (horizontal, inclined)                |  | Sample site for age date        |
|                 | Bedding (vertical, estimated)                 |  | Drill site                      |
|                 | Fault (observed or positive)                  |  | Showings, prospects & old works |
|                 | Fault (inferred or probable)                  |  | Geological section line         |
|                 | Anticline                                     |  | Areas mapped in 2nd phase       |
|                 | Syncline                                      |  |                                 |