

STANDARDIZED DATA SET NAMES FOR DRG PRODUCTS

To facilitate file manipulation by the widest possible range of potential users, data and text files on this CD-ROM conform to the DOS "eight plus three" (8.3) file naming convention.

The associated DRG image (.TIF), world (.TFW), and metadata (.FGD) files on this disc incorporate an intelligent data set name (DSN) consisting of descriptive metadata wrapped around a standardized kernel that describes the spatial location of the file. The intent of this file naming protocol is to positively identify the spatial identity of the file and describe its categoric identity.

The DSN is designed to geographically locate DRG's of quadrangles using the 7.5-minute grid, clearly identifying those that fall exactly on the grid. DRG's that are not aligned with the 7.5-minute grid can be named with this convention but additional consideration is required to relate these undersize, oversize, or offset quadrangles to their most logical and unique 7.5-minute grid location.

For additional information about the DSN convention applied to DRG's, refer to [MAPINDEX.TXT](#) in the \DOCUMENT directory.

DSN CONVENTION APPLIED TO DRG PRODUCTS

CATEGORY + ----- One Alpha (A)	LAT/LONG OF SECONDARY CELL + ----- Five Numeric (YYXXX)	MAP INDEX NUMBER + ----- One Alpha + One Numeric (A) (N)
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PERIOD OPERAND + FILE TYPE

Three
Alpha
(TIF)

AYYXXXAN.TIF

Where:

A = Category (Series, Scale, and Class)
YY = Degrees Latitude (Secondary Cell)
XXX = Degrees Longitude (Secondary Cell)
AN = Map Index Number (Primary Cell)
TIF = Tagged Image File Format

EXAMPLE: O37091H7.TIF = Rolla, Missouri, 7.5-minute, 1:24,000-scale Topographic Quadrangle

Where:

O = 7.5-minute, 1:24,000-scale Topographic Quadrangle
37 = Degrees Latitude
091 = Degrees Longitude
H7 = Map Index Number for the Rolla Quadrangle
TIF = Tagged Image File Format

DEFINITIONS:

CATEGORY - One alpha character identifying the series, scale, and class of the DRG.

CATEGORY	SERIES	SCALE	CLASS
R	7.5'	1:20,000	Topographic
O	7.5'	1:24,000	Topographic
P	7.5'	1:24,000	Orthophoto
L	7.5'	1:25,000	Topographic
J	7.5'	1:30,000	Topographic
K	7.5' X15'	1:25,000	Topographic
I	Alaska	1:63,360	Topographic
G	30' x60'	1:100,000	Planimetric
F	30' x60'	1:100,000	Topographic
C	1 x 2 Degree	1:250,000	Topographic

LAT/LONG OF SECONDARY CELL - Expressed in degrees of latitude (2 characters) and degrees of longitude (3 characters), defining the southeast corner (integer grid corner), of the secondary cell.

To maintain unique DSN's throughout this series, the longitude of secondary cells falling in the eastern hemisphere, west of 180-degrees, are incremented upward from 180. As an example, the southeast corner of a 1-degree secondary cell located at 52-degrees north latitude and 175-degrees east longitude (5 degrees west of 180) converts to the following five-character code describing the cell's location: 52185.

SECONDARY CELL - 1- by 1-degree cell (except Alaska) defined by integer latitude and longitude. Cells in Alaska vary in size, but are always identified by integer latitude and longitude.

MAP INDEX NUMBER - Two-character alphanumeric code locating the primary cell (quadrangle) within the secondary cell.

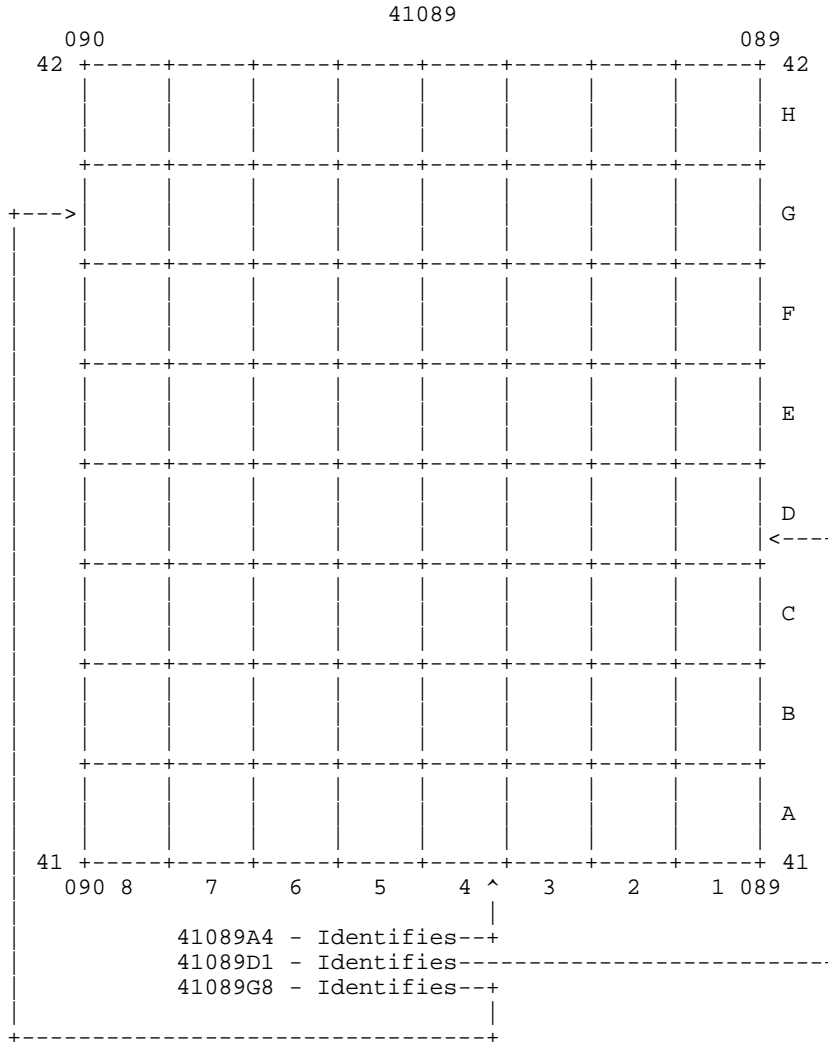
TIF - Tagged Image File Format (TIFF) - A tag based file format that is designed to promote the interchange of digital image data.

The following examples of Data Set Names for the DRG products contained on this disc are not all inclusive. Normal packaging of one 1:250,000-scale, two 1:100,000-scale, and sixty-four 1:24,000-scale quadrangles can involve combining several categories of maps on each disc. For example, to complete a 1- by 1-degree coverage area, it is entirely possible that a single distributable DRG CD-ROM can contain one or more of the following map categories:

- 1:24,000- and 1:25,000-scale, 7.5-minute quadrangles.
- 1:24,000-scale 7.5-minute Provisional Maps.
- 1:24,000-scale 7.5-minute Orthophotomaps.
- 1:25,000-scale 7.5- by 15-minute quadrangles.

As a result, optimal packaging of sixty-four 7.5-minute quadrangles is compromised if one or more 7.5- by 15-minute quads are included in a 1-by 1-degree cell.

DATA SET NAMES
For
7.5- by 7.5-Minute Series
1:24,000- And 1:25,000-Scale Data



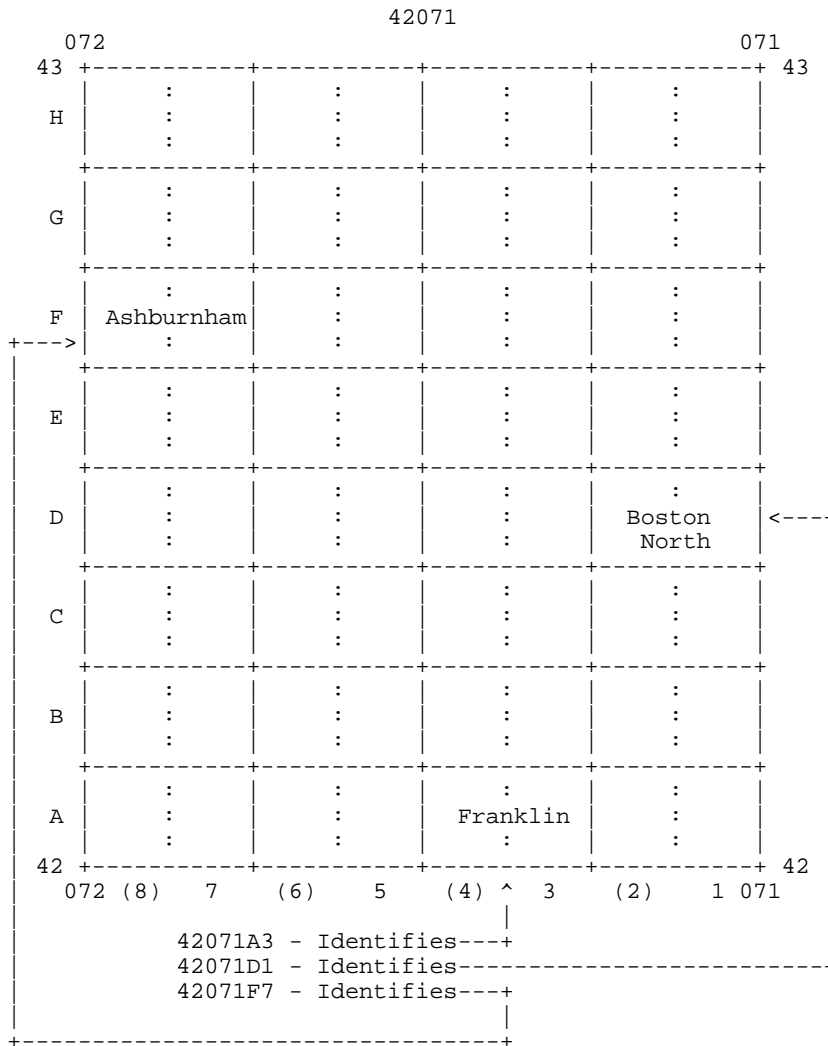
Quadrangle	Full data set name
41089A4 = Lacon, IL.	O41089A4.TIF
41089D1 = Troy Grove, IL.	O41089D1.TIF
41089G8 = Morrison, IL.	+--O41089G8.TIF

Where:

- O = 7.5-minute, 1:24,000-scale Topographic Quadrangle
- 41 = Degrees Latitude
- 089 = Degrees Longitude
- G8 = Map Index Number for the Morrison Quadrangle
- TIF = Tagged Image File Format

In the following example, the DSN identifies 7.5- by 15-minute primary cells (quadrangles). Dotted vertical lines indicate the normal 7.5- by 7.5-minute grid spacing. As in the previous example, rows A through H and columns 1 through 8 are used to determine the Map Index Number. In this case, however, identification of the 7.5- by 15-minute primary cell is based solely on columns 1, 3, 5, and 7.

**DATA SET NAMES
For
7.5- by 15-Minute Series
1:25,000-Scale Data**



Quadrangle	Full data set name
42071A3 = Franklin, MA	K42071A3.TIF
42071D1 = Boston North, MA	K42071D1.TIF
42071F7 = Ashburnham, MA-NH	+----K42071F7.TIF

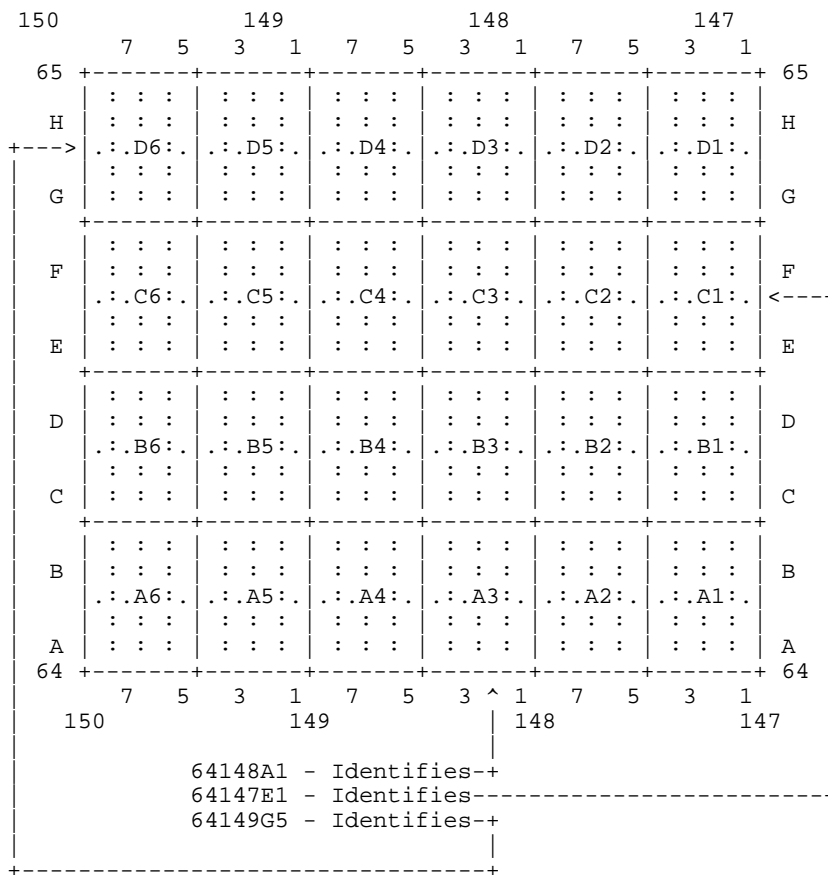
Where:

- K = 7.5- by 15-minute, 1:25,000-scale Topographic Quadrangle
- 42 = Degrees Latitude
- 071 = Degrees Longitude
- F7 = Map Index Number for the Ashburnham Quadrangle
- TIF = Tagged Image File Format

In the example below, the Fairbanks 1:250,000-scale quadrangle comprises three 1- by 1-degree secondary cells. Dashed grids represent 15- by 30-minute, 1:63,360-scale quadrangles. Dotted lines represent 7.5- by 7.5-minute subdivisions of sixty-four 7.5-minute cells comprising the 1-degree cell. These cells are the primary identifiers of the map locations based on the position of the 7.5-minute cell nearest the southeast corner of each 1:63,360-scale quadrangle.

**DATA SET NAMES
For
Alaska 1:63,360-Scale Data**

FAIRBANKS (1:250,000)

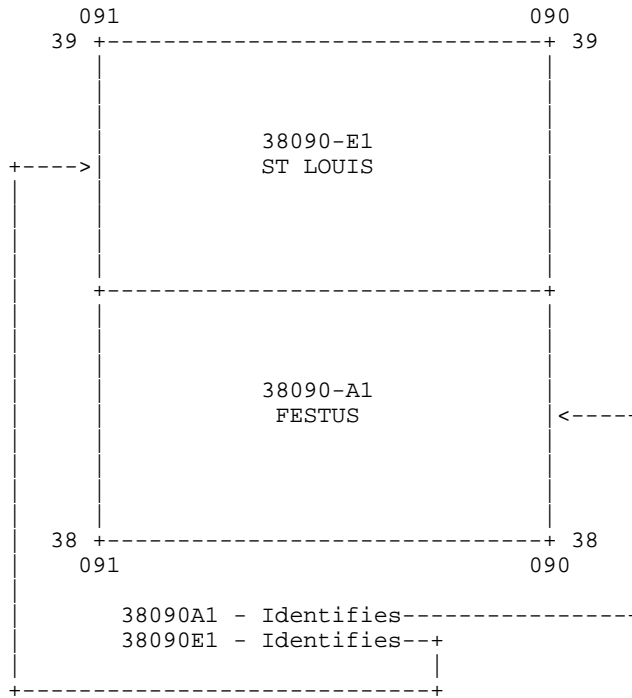


Quadrangle	Full data set name
64148A1 = Fairbanks (A3)	I64148A1.TIF
64147E1 = Fairbanks (C1)	I64147E1.TIF
64149G5 = Fairbanks (D6)	I64149G5.TIF

Where:

- I = Alaska, 1:63,360-scale Topographic Quadrangle
- 64 = Degrees Latitude
- 147 = Degrees Longitude
- G5 = Map Index Number for the Fairbanks (D6) Quadrangle
- TIF = Tagged Image File Format

DATA SET NAMES
For
30- by 60-Minute Series
1:100,000-Scale Data



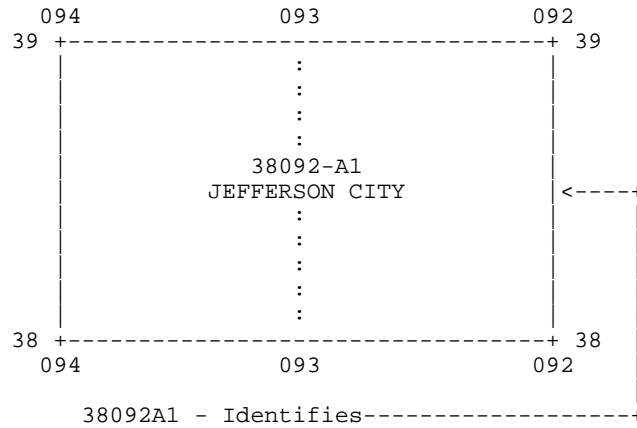
Quadrangle	Full data set name
38090A1 = Festus, MO-IL	F38090A1.TIF
38090E1 = St. Louis, MO-IL	+---F38090E1.TIF

Where:

- F = 1:100,000-scale, 30- by 60-minute Topographic Quadrangle
- 38 = Degrees Latitude
- 090 = Degrees Longitude
- E1 = Map Index Number for the St. Louis Quadrangle
- TIF = Tagged Image File Format

In the following example, the dotted vertical line represents the division between the east and west 1-degree secondary cells of the 1:250,000-scale quadrangle for illustrative purposes only.

**DATA SET NAMES
For
1- by 2-Degree Series
1:250,000-Scale Data**



 Quadrangle Full data set name

38092A1 = Jefferson City, MO +---C38092A1.TIF

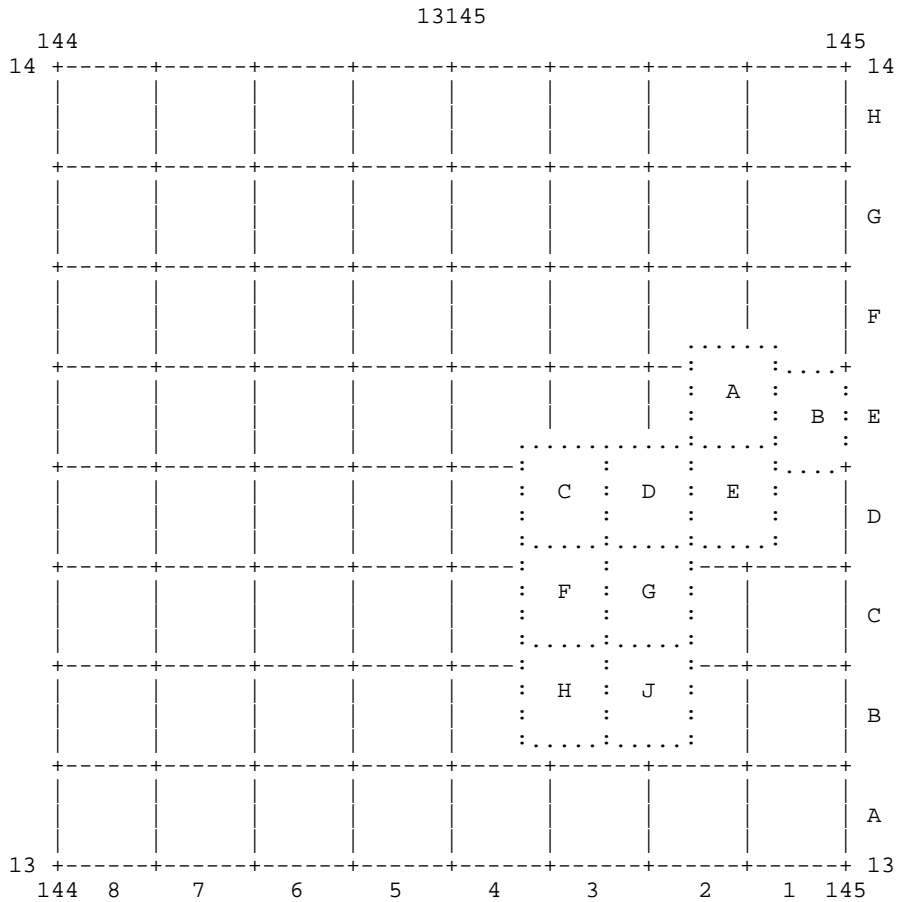
|
Where:

- C = 1:250,000-scale, 1- by 2-degree Topographic Quadrangle
- 38 = Degrees Latitude
- 092 = Degrees Longitude
- A1 = Map Index Number for the Jefferson City Quadrangle
- TIF = Tagged Image File Format

The following two examples describe cases where the products to be named do not conform to the normal grid. The examples illustrate the process of naming quads that are undersized, oversized, or off-set in relationship to the regular 7.5-minute grid.

Example 1

**DATA SET NAMES
For
The Pacific Islands (Guam)
Shifted Undersize Quads
1:24,000-Scale Data**



Dashed grids represent the normal 7.5- by 7.5-minute quadrangles (primary cells) comprising the 1- by 1-degree secondary cell.

Dotted grids represent undersize USGS quadrangles that have been shifted from the normal 7.5- by 7.5-minute configuration to cover land. Uppercase letters (A-J) within each dotted grid represent individual quadrangles.

Quad name	Secondary cell and series number
Inarajan (J)	13145B2
Merizo (H)	13145B3
Talofoyo (G)	13145C2
Agat (F)	13145C3
Dededo (E)	13145D1
Agana (D)	13145D2
Apra Harbor (C)	13145D3
Pati Point (B)	13145E1
Retidian Point (A)	13145E2

Full data set names for the above examples:

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Inarajan.....O13145B2.TIF
Merizo.....O13145B3.TIF
Talofoyo.....O13145C2.TIF
Agat.....O13145C3.TIF
Dededo.....O13145D1.TIF
Agana.....O13145D2.TIF
Apra Harbor.....O13145D3.TIF
Pati Point.....O13145E1.TIF
Retidian Point.....O13145E2.TIF

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Where:

- O = 1:24,000-scale Topographic Quadrangle
- 13 = Degrees Latitude
- 145 = Degrees Longitude
- E2 = Map Index Number for the Retidian Point Quadrangle
- TIF = Tagged Image File Format

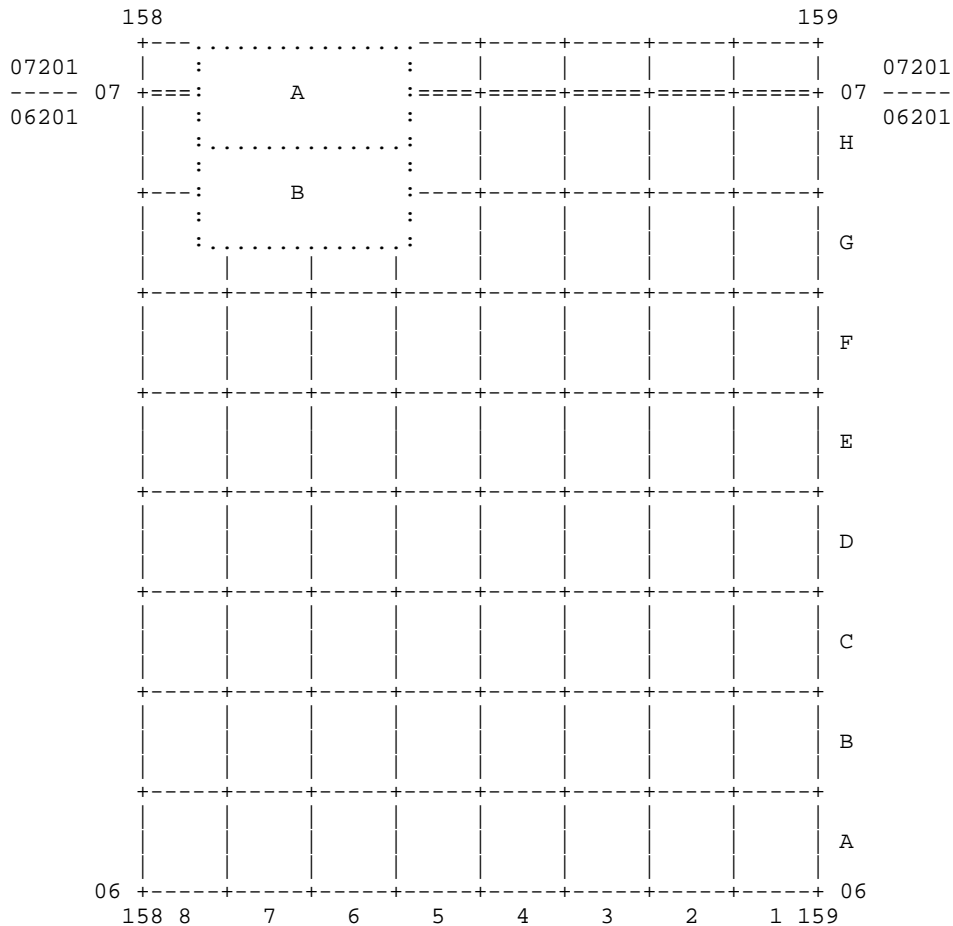
Example 1 illustrates the hierarchy for determining cells and series numbers for quadrangles that are not aligned with the 7.5-minute grid (undersized/offset). Quads C, D, E, F, G, H, and J assume the series number assigned to the primary cell in which their southeast corner lies. The position of the southeast corner, or nearest southeast cell corner, is the PRINCIPAL determinant of series number within the secondary cell.

However, the southeast corners of quads A and B fall in primary cell E1 so the NEXT determining factor is the percentage of area in the quadrangles bounded by this cell. In this case all of quad B is bound by primary cell E1, while a relatively small portion of quad A is bounded by the E1 cell. As a result, quadrangle B is assigned to the E1 cell.

Quadrangle A is assigned to the primary cell associated with the cell bounding the most area within the quad, not having already been assigned to another quad. In this case quadrangle A is assigned to cell E2. To properly determine the series number, for this case, all the surrounding quads must be considered.

Example 2

DATA SET NAMES
For
The Pacific Islands (Pohnpei Islands)
Overedge, Oversize And Shifted Quads
1:25,000-Scale Data



Dashed grids represent the normal 7.5- by 7.5-minute quadrangles (primary cells) comprising the 1- by 1-degree secondary cell. This particular secondary cell is extended to the north above 7 degrees latitude to include the Pohnpei North (H5) oversize quadrangle.

Dotted grids represent oversize USGS quadrangles that have been shifted from the normal 7.5- by 7.5-minute configuration to cover land. Uppercase letters A and B within each dotted grid represent individual quadrangles.

Quad name	Secondary cell and series number
Pohnpei South (B)	L06159G5
Pohnpei North (A)	L06159H5

Full data set names for the above examples:

Pohnpei South (B).....L06159G5.TIF
Pohnpei North (A).....L06159H5.TIF

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Where:

- L = 1:25,000-scale Topographic Quadrangle
- 06 = Degrees Latitude
- 159 = Degrees Longitude
- H5 = Map Index Number for the Pohnpei North Quadrangle
- TIF = Tagged Image File Format

Example 2 illustrates possible overedge quad configurations that often occur in island areas. Graphics are shifted and adjusted in size to minimize the number of map sheets required to effect coverage of island land masses.

Cases such as these can be solved as illustrated for proper data set name identification. If the quad has an overedge that is adjacent to the southeast corner of the cell, the normal southeast corner coordinates of the 7.5-minute grid intersection is used for DSN determination.

