ArcGIS Desktop Products Data Sheet

November 2004

The ArcGIS[™] Desktop products consist of ArcReader[™], ArcView[®], ArcEditor[™], and ArcInfo[™]. These products are built on a common architecture with the same user interface.

- ArcReader is a free, downloadable, easy-to-use application for viewing, exploring, and printing published map files (PMF).
- ArcView adds comprehensive mapping and analysis tools along with simple editing and geoprocessing tools.
- ArcEditor includes the full functionality of ArcView plus advanced editing capabilities for geodatabases.
- ArcInfo extends the functionality of all three products to include advanced geoprocessing.



ArcGIS system support

Operating Systems: ArcReader, ArcView, and ArcEditor Windows NT Windows 2000 Windows XP (Home Edition and Professional)

ArcInfo Windows NT Windows 2000 Windows XP (Home Edition and Professional) ArcInfo Workstation adds UNIX support.

Contents

Key Features in ArcReader, ArcView, ArcEditor, and Arc	Info 9.0
Map Interaction	p. 2
Document Support	p. 2
Map Display	p. 2
Printing	p. 2
Map Export	p. 2
Application Framework	р. 2

Additional Key Features in ArcView, ArcEditor, and ArcInfo 9.0

Map Interaction	p.	3
Document Support	p.	3
Map Display	p.	3
Map Text	p.	4
Page Layout and Printing	p.	4
Geoprocessing	p.	5
Utility Network Analysis	p.	6
Editing	p.	7
Georeferencing	p.	8
Data Support	p.	9
Data Management	p.	9
Metadata	p.	10
GPS Support	p.	10
Tablet PC Support	p.	10
Application Customization	p.	10

Additional Key Features in ArcEditor and ArcInfo 9.0

Data Editing and Management	p.	11
Linear Referencing (Routes)	p.	12
UML/Case Tool Integration	p.	12
Geodatabase Administration	p.	13
Manage Coverage Data	p.	13

Additional Key Features in ArcInfo 9.0

Geoprocessing	p. 14
Geoprocessing of Coverage Data	p. 15
ArcInfo Workstation	p. 16

Key Features in ArcReader, ArcView, ArcEditor, and ArcInfo 9.0

ArcReader provides the following functionality:

Map Interaction

- Pan/Zoom/Identify features.
- Use spatial bookmarks.
- Find features in the map.
- Access hyperlinks.
- Use dynamic map tips.
- Use magnification window.
- Measure distances.

Document Support

• Read published map files (from ArcGIS Publisher).

Map Display

- Visualize the map page or a specific set of data.
- Perform on-the-fly projection of all data.
- Enable full cartographic visualization of any PMF file.

Printing

• Support Windows and PostScript print drivers.

Map Export

• Windows bit map (BMP)

Application Framework

• Standard Microsoft Windows look and feel

ArcView contains all the functionality of ArcReader plus the following:

Map Interaction

- Use tools for selecting data by location.
- Use tools for selecting data by attribute.
- Create hyperlink to external application, macro, or URL.
- Create/Manage/Use spatial bookmarks.
- Use overview window.

Document Support

- Create and edit map documents (MXD).
- Use map templates (MXT) to standardize maps.
- Use published map files (when enabled by ArcGIS Publisher).
- Import ArcView 3.x APR and AVL files.

Map Display

- Interactively set percent transparency for all data layers.
- Set a minimum and maximum scale to display data.
- Clip the map display to a feature or graphic.
- Project all data on-the-fly to the coordinate system of your map.
- Display map grids.
 - Graticule
 - Measured grid
 - Reference grid
- Display extent rectangles for other data (reference and overview maps).

Tabular Data

- Use on-the-fly dynamic joins between different databases.
- Create and use many-to-one and one-to-many relationships.
- View joined data tables.
- Create statistics.
- Summarize data.
- Create charts and reports.
- Build detailed reports using Crystal Reports.
- Sort by multiple attributes.
- Connect to and use remote database tables.
- Display tabular X,Y point data from a file or table on a map.
- Find and display dynamic segmentation events (point, linear, continuous) on routes.

Vector Data Display

- Control selection color for each data set.
- Show attributes when cursor pauses over a feature (map tips).
- Fix symbology to a specific map scale.
- Establish hyperlinks to documents, URLs, or Macros.
- Interactively exclude specific features from the display.
- Control which features to display using a SQL query.
- Control which data fields are accessible from the map.
- Join (1 to 1) vector data to other tables.
- Relate (1 to M) vector data to other tables.

Thematic Vector Data Classifications

- Single symbol
- Unique value
- Match to predefined style
- Graduated colors or symbols
- Proportional symbols
- Dot density mapping
- Chart mapping including pie and bar chart
- · Bivariate and multivariate data rendering
- Interactive histogram for data classification

Symbology

- Use interactive symbol composer.
- Select advanced drawing options for control over draw order.
- Access more than 18,000 predefined symbols.
- Use halos and advanced background symbols.
- Define symbols for fill, lines, outlines, and points.
- Support user-imported graphic fill patterns.

Raster Data Display

- Display multiband images by assigning RGB values to the bands.
- Use individual band settings.
- Display each unique value in your images with a discrete color.
- Display image values using a color map.
- Display image data by grouping values into classification using one of the following classification methods: equal interval, defined interval, quantile, natural breaks (Jenks), or standard deviation.
- Display multiband raster data using RGB values.
- Display images with a gradual color ramp using a variety of data stretching algorithms
 - Standard deviations
 - Histogram equalize

- Minimum–Maximum
- Histogram specification
- Custom
- None
- Calculate display statistics for continuous data based on a variety of extents.
 - Entire raster data sets
 - Current display extent
 - A custom extent
- Control raster display contrast, brightness and transparency.
- Display tiles or images for raster catalogs.
 - Footprints only
 - Selected footprints
- Import renderer or statistics from another layer.
- Display raster values while navigating the map with map tips.
- Display raster resolution in map TOC.
- Choose a resample method for data display.
 - Nearest neighbor
 - Bilinear interpolation
 - Cubic convolution

Surface Display

- Classifying and rendering
 - Faces
 - Nodes
 - Triangles
- Slope
- Hillshade
- Aspect
- Elevation
- Modifying the sun position to customize the surface display

Geodatabase Topology Display

- Display a summary of the errors and exceptions in the topology.
- Display the feature classes and rules in the topology.
- Display errors, exception, and dirty areas in the map.

Map Addresses

- Single or batch address geocoding
- Tools for processing addresses that could not be found
- Client/Server database support for geocoding on the server*
- Multiple geocoding services (indexes) per data source

Map Text

Dynamic Map Text

- Dynamic on-the-fly labeling
- · Automatic conflict detection and label placement
- Label placement rules for setting priority between layers
- Placement rules for setting importance of labels vs. features
- Many predefined label styles (e.g., highway shields)
- Labels rotate from an attribute field
- Multiple dynamic labeling schemes built for each map layer
- Control which features in a layer display labels
- Advanced text formatting tags for dynamic label symbology

Static Map Text

- Use interactive label tools (callout, label, spline, paragraph text).
- Create text annotation data from labels.
- Store annotation in a geodatabase or a map document.

Page Layout and Printing

- Easy-to-use wizards and tools to insert map elements including
 - Title
 - Text
 - Neatlines
 - Legend
 - North arrows
 - Scale bar
 - Scale text
 - Pictures
 - OLE objects
 - Measured reference grid
 - Graticules
- Export map to
 - Enhanced Metafile (EMF)
 - Windows Bit Map (BMP)
 - Encapsulated PostScript (EPS)
 - Tagged Image File Format (TIFF)
 - Portable Document Format (PDF)
 - Joint Photographic Experts Group (JPEG)
 - Portable Network Graphics (PNG)
 - Graphics Interchange Format (GIF)
 - Scalable Vector Graphics (SVG)
 - Adobe Illustrator (AI)
 - PostScript Color Separates (with page marks)

Geoprocessing

- String together geoprocessing tools using a visual modeling environment (ModelBuilder[™]).
- Use organized geoprocessing tools for easy access (ArcToolbox[™]).
 - Contents
 - Index
 - Search
 - Favorite tools
- Use shortcuts to geoprocessing tools through a command line.
- Access geoprocessing functionality from a variety of scripting or programming environments including.
 - JavaScript
 - VBScript
 - Visual Basic
 - VBA
 - C++
 - Visual Studio .NET
 - Python
 - Perl
- Create and share new geoprocessing tools using models or scripts.
- Save tools in a geodatabase or on the file system.

Analysis Tools

- Clip
- Intersect
- Union
- Buffer
- Multiple Ring Buffer

Raster Conversion Tools

- Raster to ASCII
- ASCII to Raster
- Raster to Float
- Float to Raster
- Raster to Point
- Raster to Polygon
- Raster to Polyline
- Feature to Raster
- DEM to Raster
- Raster to Other Format (multiple)

Table Conversion Tools

• Table to dBASE (multiple)

Geodatabase Conversion Tools

- Feature Class to Feature Class
- Feature Class to Geodatabase (multiple)
- Import CAD Annotation
- Import Coverage Annotation
- Import From CAD
- Raster to Geodatabase (multiple)
- Table to Geodatabase (multiple)
- Table to Table

Shapefile Conversion Tools

• Feature Class to Shapefile (multiple)

Feature Class Tools

- Append Annotation Feature Classes
- Create Feature Classes
- Update Annotation Feature Classes

Feature Management Tools

- Add X,Y Coordinates
- Check Geometry
- Copy Features
- Multipart to Single Part
- Repair Geometry

Field Data Management

- Add field
- Calculate Field
- Delete Field

General Data Management Tools

- Append
- Copy
- Delete
- Rename
- Select Data

Generalization Tools

• Dissolve

Layer and Table View Tools

- Make Feature Layer
- Make Query Layer
- Make Raster Catalog Layer
- Make Raster Layer
- Make Table View
- Make X,Y Event Layer

General Projection Tools

• Define Projection (single input)

Vector Projection Tools

- Batch Project
- Create Spatial Reference
- Project (single input)

Raster Transformation/Projection Tools

- Mirror
- Project Raster (single input)
- Rescale
- Rotate
- Shift
- Warp

Raster Management Tools

- Batch Build Pyramids
- Batch Calculate Statistics
- Build Pyramids
- Calculate Statistics
- Clip
- Composite Bands
- Copy Raster
- Create Raster Catalog Item
- Create Raster Catalog
- Create Raster Data Set
- Delete Raster Catalog Items
- Mosaic
- Mosaic to New Raster
- Resample

Table Management Tools

- Copy Rows
- Create Table

- Delete Rows
- Flip

Geocoding

- Automate Geocoding Indexes
- Create Address Locator
- Deautomate Geocoding Indexes
- Delete Address Locator
- Geocode Addresses
- Rebuild Geocoding Indexes
- Standardize Addresses

Linear Referencing Tools

• Make Route Event Layer

Spatial Statistics Tools

- Average Nearest Neighbor
- High/Low Clustering (Getis–Ord General G)
- Spatial Autocorrelation (Morans I)
- Cluster and Outlier Analysis (Anselin Local Morans I)
- Hot Spot Analysis (Getis–Ord Gi*)
- Central Feature
- Directional Distribution (Standard Deviational Ellipse)
- Linear Directional Mean
- Mean Center
- Standard Distance
- Calculate Areas
- Collect Events
- Export Feature Attribute to ASCII

Utility Network Analysis

- Trace upstream.
- Trace downstream.
- Find common ancestors.
- Find connected network features.
- Find loops in network.
- Find disconnected network features.
- Find path.
- Find path upstream.
- Find upstream accumulation.
- Isolate a point on the network.

Editing

- Simultaneously edit multiple layers
- Unlimited undo/redo operations

Snapping

- By layer
 - Vertex
 - Edge
 - Endpoint
- By new geometry
 - Edges
 - Vertices
 - Perpendicular
- Topology nodes interactively
 - Endpoint
 - Vertex
 - Midpoint
 - Edge
- Set snapping tolerance
 - By pixels
 - By map units
 - Interactively
- Snap tips indicating what is being snapped to
- Dockable snapping dialog that makes it quick and easy to change snapping while editing

Geometry Construction Options

- Constrain the next segment by direction
- Constrain the next segment with a deflection angle from last segment
- Constrain the next segment by length
- Specify an exact x,y location
- Specify an x,y difference from the last vertex
- Constrain the next segment to be parallel to the last segment
- Constrain the next segment to be perpendicular to last segment
- Constrain the next segment based on an angle from an existing feature segment in the map
- Create geometry from existing features in the map
- Create a curve tangent to the last segment
- Finish a polygon by generating perpendicular segments from the first and last segment.
- Flip the orientation of the geometry.
- Trim geometry to a specific length.

Geometry Creation Tools

- Point and Click On-Screen Digitizing
- Stream Digitizing
- Add a Coordinate Based on an Angle From One Location and a Distance From Another
- Add a Coordinate Based on the Implied Intersection of Two Segments
- Construct a True Curve
- Construct a Tangent Curve
- Add a Coordinate Based on a Distance From Ttwo Known Locations
- Add a Coordinate at the Midpoint Between Two Known Locations
- Add coordinates along existing coordinates

Feature Manipulation Tasks

- Create features using new geometry.
- Create new polygons using the geometry of existing features (autocomplete polygons).
- Reshape existing features.
- Cut polygon features.
- Create mirror copies of existing features.
- Extend or trim existing features.
- Add, delete interactively move, or modify the coordinate values for vertex locations of existing features.

Feature Editing Tools including

- Move, Rotate, Delete, Copy, and Paste
- Split a Line at a Distance or Percentage
- Divide a Line, Based on a Distance, a Number of Segments, or a Measure Value (M Coordinate)
- Buffer Features
- Copy Lines Parallel to Their Existing Location
- Merge Existing Features
- Create New Features by Merging Features in the Same or Another Layer (union)
- Create New Features From the Buffer of Existing Features
- Create New Polygons by Intersecting Existing feature Classes
- Clip One or More Polygons With Another Polygon
- Extend and Trim Lines With Other Features in the Map

Attribute Editing

- Modify each selected row individually or as a group (Attributes dialog).
- Copy attributes to one or more rows simultaneously.

- Calculate attribute values using scripts (field calculator).
- Validate attribute values using rules defining valid values (domains).

Multipart Features (Point, line, and polygon)

- Add and delete parts.
- Zoom to parts.
- Add, delete, and edit vertex locations.
- Create separate features from each part (explode).

Route (linear referencing) Editing

- Interactively modify M coordinate values.
- Interactively drop M coordinates.

Topological Editing (Map topologies only)

- Construct and edit topologies created from layers in the map.
- Move topological edges and nodes.
- · Show or select adjacent or connected features.
- Reshape shared edges between features.
- Modify the coordinates of shared edges or nodes.
- Split shared edges at a specific point, distance, or percentage along the edge.
- Move edges and nodes to a specific location.
- Shift edges and nodes based on an offset from their current location.
- Merge connected edges.
- Control which adjacent or connected features move when a shared edge or node is moved.

Map Navigation While Editing

- Zoom to feature vertices.
- Zoom to feature parts.
- Interactively pan and zoom using the editing tools and shortcut keys.
- Pan and zoom to unplaced annotation or the feature associated with the unplaced annotation.

Annotation Editing (Text features)

- Interactively move, rotate, and scale annotation.
- Add horizontal or angled annotation.
- Add annotation with a leader line.
- Create annotation that follows a curved line or the shape of an existing feature.

- Dynamically pull annotation values from other layers in the map.
- Interactively manage annotation that could not be placed during initial annotation creation.
- Edit each word in an annotation string independently.
- Interactively stack and unstack annotation.
- Flip annotation strings.
- Interactively modify the curvature and orientation of a line.
- Edit the symbology of a single annotation feature or a group of annotation features simultaneously.

General Editing

- Integrate with ArcPad for field editing.
- Provide digitizer support for devices with Wintab compliant drivers.
- Make measurements using any units that you choose.
- Optionally scale features when individual vertices are moved.
- Automatically correct ground measures appropriately in the GIS.
- Align vector data using one of five adjustment methods.
 - Rubber sheeting
 - Transformation Affine
 - Transformation Similarity
 - Transformation Projective
 - Edgematching
- Transfer accurate attributes from features with inaccurate geometry to features with accurate geometry.

Spatial Referencing Image Data (Georeferencing)

- Use one of the following transformation methods:
 - 1st order polynomial
 - 2nd order polynomial
 - 3rd order polynomial
- Image shift, flip, rotate, or fit to display.
- Interactively specify from and to control points.
- Save and load control points with error and accuracy information.
- Save spatial reference information.
 - Create a new data set (rectify)
 - Save reference information with the image

Data Support

Direct Read of Vector Data

- Geodatabase
- Shapefiles
- ArcInfo Coverages
- PC ARC/INFO[®] Coverages
- Smart Data Compression (SDC) Data
- Vector Product Format (VPF) Data
- Web services
 - ArcIMS[®] Image Service
 - ArcIMS Feature Services
 - Geography NetworkSM Feature Service
 - ArcIMS MapService
 - ArcGIS® Server Services
 - OGC Web Map Service (WMS)

Direct Editing of Vector Data

- Personal geodatabase simple features (.mdb)
- Personal geodatabase simple features checked out from an enterprise geodatabase
- Shapefiles

Direct read of CAD Data

- Autodesk Drawing Exchange Format (DXF)
- AutoCAD Drawing File (DWG)
- Microstation DGN Files

Direct Read of Raster Data

- ARC Digitized Raster Graphics (ADRG)
- ArcSDE Rasters
- Band Interleaved by Line (ESRI BIL), Band Interleaved by Pixel (ESRI BIP), Band Sequential (ESRI BSQ)
- Bit Map (BMP), Device Independent Bit Map (DIB) format, or Microsoft Windows Bit Map
- Compressed ARC Digitized Raster Graphics (CADRG)
- Controlled Image Base (CIB)
- Digital Geographic Information Exchange Standard (DIGEST) Arc Standard Raster Product (ASRP), UTM/UPS Standard Raster Product (USRP)
- Digital Terrain Elevation Data (DTED) Level 0, 1, and 2
- ER Mapper
- ERDAS 7.5 GIS
- ERDAS 7.5 LAN

- ERDAS RAW
- Graphics Interchange Format (GIF)
- Intergraph Raster Files: CIT—Binary Data; COT—Grayscale Data
- Joint Photographic Experts Group (JPEG) Joint File Interchange Format (JFIF)
- JPEG 2000
- Multiresolution Seamless Image Database (MrSID generation 2 and 3)
- National Image Transfer Format (NITF)
- Portable Network Graphics (PNG)

Direct read and Write of Raster Data

- ERDAS IMAGINE
- ESRI GRID
- ESRI GRID Stack
- Tag Image File Format (TIFF) (GeoTIFF tags are supported.)

Direct Read of Other Data

- ESRI TIN
- dBASE (DBF)
- Text (TXT)
- ESRI INFO files
- OLE DB Connections
- ODBC Connections
- Microsoft Access

Data Management

- Move, copy, and paste GIS data and all associated files.
- Manage raster data sets and raster catalogs in a personal geodatabase.
- Create
 - Personal geodatabases
 - Feature classes
 - Domains
 - Shapefiles
- Search for data sets on the local network or the Internet by
 - Name
 - Туре
 - Location
 - Date
 - Metadata tag
- Administer ArcGIS Server.

Metadata

- Automatically or manually generate metadata for data files.
- Import/Export metadata.
- View metadata using a variety of styles
 - FGDC
 - FGDC Classic
 - FGDC ESRI
 - FGDC FAQ
 - FGDC Geography Network
 - ISO
 - ISO Geography Network
 - Raw XML
- Find tool to find data based on metadata and location.
- Publish .metadata to the ArcIMS Metadata Server

GPS Support

- Display real-time location points from a GPS receiver.
- Dynamically center the map on the current GPS point.
- Store GPS locations in a log file.
- Filter by GPS input by time, distance, or deflection.

Tablet PC Support

- Support of Windows XP Tablet PC Edition.
- Edit features or graphics with a stylus.
- Annotate the map with redlining and highlighting tools.
- Find handwritten notes within the map.
- Convert redlining handwriting to text.

Application Customization

- Dockable/Floating toolbars
- Customizable look and feel (drag and drop to rearrange tools/ toolbars)
- Creates new toolbars or menus without programming
- Complies with windows display settings
- Creates and saves macros using Visual Basic for Applications (VBA)
- Extends the applications with any COM compliant development environment
- UNICODE support for multilanguage attributes

ArcEditor contains all the functionality of ArcView and ArcReader plus the following.

Data Editing and Management

General

- Edit all features in a personal or enterprise geodatabase.
 - Geometric networks
 - Topologies
 - Subtypes
 - Relationship classes
 - Dimensions and custom features
 - Feature-linked annotation
- Copy feature geometry from one location/layer to a new location/layer.
- Create a curved line at the intersection of two existing lines (fillet).

Attribute Editing and Validation

- Group records in a table into subtypes.
- Create and edit relationships between features.
 - 1 to 1
 - 1 to many
 - Many to many
- Add behavior to geodatabase relationships.
 - Moving a feature moves the related feature
 - Deleting one feature deletes the related feature
- Specify cardinality rules for relationships.
- Store attributes for relationships.

Geodatabase Topology

- Create and manage geodatabase topology.
- Specify a hierarchy for vertex snapping during topology creation.
- Specify topology rules that match business rules.
 - Polygons contain points.
 - Polygons must not overlap.
 - Polygons must not have gaps.
 - Polygons must not overlap with polygons in another feature class.
 - Polygons must be covered by one polygon in another feature class.
 - Polygons must be covered by one or more polygons in another feature class.

- Polygons from two feature classes must cover each other.
- Polygon boundaries must be covered by lines of another feature class.
- Polygon boundaries must be covered by the boundaries of polygons in another feature class.
- Lines must not overlap.
- Lines must be single part.
- Lines must not self-overlap.
- Lines must not overlap with lines in another feature class.
- Lines must not have dangles.
- Lines must not have pseudo nodes.
- Lines must not intersect.
- Lines must not self intersect.
- Line endpoints must be covered by points of another feature class.
- Lines must be covered by polygon boundaries of another feature class.
- Lines must not intersect or touch interior.
- Lines must be covered by lines of another feature class.
- Points must be covered by lines of another feature class.
- Points must be inside polygons.
- Points must be covered by the endpoints of lines.
- Points must be covered by the boundary of polygons of another feature class.
- Construct polygons from lines or lines from polygons.
- Split lines where they intersect.
- Validate a specific area or the entire topology.
- Search for errors of a specific type within one area or the entire topology.
- Inspect errors by zooming, panning, or selecting the features.
- Automatically fix errors.
- Delete features.
- Subtract features.
- Create features.
- Merge features.
- Snap features.
- Extend lines.
- Trim lines.
- Split lines.
- Explode features.
- Simplify features.

Geometric Networks

- Create and manage utility networks.
- Create complex edge features that maintain connectivity without splitting the feature.
- Specify network connectivity rules.
 - Edge—Junction
 - Edge—Edge via Junction
- Connect and disconnect network features.
- Enable and disable network features.
- Set flow direction for a network.
- Verify, repair, and rebuild connectivity in a network.
- Verify the geometry of network features.
- Review and repair network creation errors.

Annotation and Dimensions

- Create and edit dimension features.
 - Aligned dimensions displaying the true distance between points
 - Linear dimensions displaying horizontal, vertical, or an angled distance between points
- Create and edit feature-linked annotation feature classes in a geodatabase.
- Create annotation subclasses.

Geocoding

• Create dynamic features from geocoded locations.

COGO

- Create fields to store COGO measurements.
- Add new features by specifying courses along a traverse (traverse).
- Split a line at specific intervals (proportion).
- Populate COGO measurements from the geometry of a feature (inverse).

Generalization

- Smooth line features
- Simplify the shape of line features (generalize).

Multiuser editing

- Multiple editors can simultaneously edit the same feature classes in an enterprise geodatabase
- Isolate editing projects in separate versions (create version) enabling a variety of work flows.

- Merge versions (reconcile and post).
- Delete versions.

Disconnected Editing

- Checkout raster and vector data from an enterprise geodatabase using a variety of spatial and attribute filters.
- Package edits made to a checkout geodatabase in an XML file.
- Checkin edits to an enterprise geodatabase from a checkout geodatabase.

Linear Referencing (Routes)

Editing

- Create routes for selected lines using the length of the features, a field value, or specific from and to measures.
- Edit a portion of a line without affecting the measures on the rest of the line.
- Adjust one route using points along the routes (calibrate).
- Calculate measures using from and to measures for a line.
- Set the digitized direction of the line to match measure values.
- Calculate measures based on length of line.
- Drop all the measures for a line.
- Calculate unknown measures using interpolation based on existing measures.
- Add a value to all measures on a line.
- Multiply all measure on a line by a factor.
- Add a vertex at a specific measure.

Geoprocessing

- Create routes.
- Adjust all route measures using points along the routes (calibrate).

UML/CASE Tool Integration

- Generate geodatabase schema from a UML diagram created in a CASE tool (via XMI file or Microsoft Repository).
- Apply a geodatabase schema to existing features from a CASE tool design.

Geodatabase Administration

- Create and load vector and raster data into an enterprise geodatabase.
- Create and manage raster catalogs in an enterprise geodatabase.
- Mosaic raster data in an enterprise geodatabase.
- Modify data privileges for data in an enterprise geodatabase.
- Register SDE data with the geodatabase.
- Clean up versioning tables (compress).
- Add and remove tables and feature class from the versioning environment (register and unregister as versioned).
- Create tables/feature classes that store custom objects/features.
- Update RDBMS statistics for GIS data.
- Import and export geodatabase data or schema to interchange files.
 - XML
 - ZIP (compressed text file with 4 GB file size limit)
 - Z (compressed text file with no file size limit)

Manage Coverage Data

- Add/Modify tic locations.
- Set coordinate system.
- Change the data extent.
- Create coverage relationship classes.
- Create a new coverage.
- Create a new INFO file.
- Modify coverage tolerances.

Additional Key Features in ArcInfo 9.0

ArcInfo contains all the functionality of ArcEditor, ArcView, and ArcReader plus the following:

Geoprocessing

Analysis

- Select
- Split
- Table Select
- Erase
- Identity
- Symmetrical Difference
- Update
- Near
- Point Distance
- Frequency
- Summary Statistics

Cartography

- Cul-de-Sac Masks
- Feature Outline Masks
- Intersecting Layers Masks

Conversion

- Add CAD Fields
- Create CAD XData
- Export to CAD
- Set CAD Alias
- Feature Class to Coverage

Database Management

- Compact
- Compress

Disconnected Editing

- Check In
- Check In From Delta
- Check Out
- Export to Delta

Domains

- Add Coded Value to Domain
- Assign Domain to Field

- Create Domain
- Delete Coded Value From Domain
- Delete Domain
- Domain to Table
- Remove Domain From Field
- Set Value for Range Domain
- Table to Domain

Feature Class Management

- Calculate Default Cluster Tolerance
- Calculate Default Spatial Grid Index
- Integrate

Feature Management

- Delete Features
- Feature Envelope to Polygon
- Feature to Line
- Feature to Point
- Feature to Polygon
- Feature Vertices to Points
- Polygon to Line
- Split Line at Vertices

Field Management

• Assign Default to Field

Data Generalization

- Eliminate
- Simplify Line
- Smooth Line

Data Indexing

- Add Attribute Index
- Add Spatial Index
- Remove Attribute Index
- Remove Spatial Index

Table Joins

- Add Join
- Remove Join

Layers and Table Views

- Save to Layer File
- Select Layer by Attribute
- Select Layer by Location

Additional Key Features in ArcInfo 9.0

Relationship Classes

- Create Relationship Class
- Table to Relationship Class

Subtypes

- Add Subtype
- Remove Subtype
- Set Default Subtype
- Set Subtype Field

Table Management

- Analyze
- Change Privileges
- Get Count
- Pivot Table

Topology

- Add Feature Class to Topology
- Add Rule to Topology
- Create Topology
- Remove Feature Class From Topology
- Remove Rule From Topology
- Set Cluster Tolerance
- Validate Topology

Versioning

- Alter Version
- Create Version
- Delete Version
- Post Version
- Reconcile Version
- Register as Versioned
- Unregister as Versioned

Workspace Management

- Create ArcInfo Workspace
- Create Feature Data Set
- Create Folder
- Create Personal Geodatabase

Linear Referencing (Routes)

- Dissolve Route Events
- Locate Features Along Routes
- Overlay Route Events

• Transform Route Events

Spatial Statistics

- Cluster/Outlier Analysis With Rendering
- Hot Spot Analysis With Rendering
- Collect Events With Rendering
- Count Rendering
- Z Score Rendering

Geoprocessing of Coverage Data

Analysis

- Select data
- Clip
- Select
- Split
- Erase
- Identify
- Intersect
- Union
- Update
- Buffer
- Near
- Point Distance
- Point Node
- Thiessen

Conversion

- Export to DLG
- Export to Interchange File
- Export to S57
- Export to SDTS
- Export to VPF
- Ungenerate
- Advanced TIGER Conversion
- Basic TIGER Conversion
- Generate
- Import From DLG
- Import From Interchange File
- Import From S57
- Import From SDTS
- Import From VPF

Additional Key Features in ArcInfo 9.0

Aggregation

• Append

Composite Features

- Line Coverage to Region
- Line Coverage to Route
- Polygon Coverage to Region
- Region to Polygon Coverage

Generalization

- Aggregate Polygons
- Simplify Building
- Collapse Dual Lines to Centerline
- Dissolve
- Eliminate
- Find Conflicts
- Simplify Line or Polygon

Table Management

- Drop Index
- Index Item
- Add Item
- Drop Item
- Join Info Tables
- Add X,Y Coordinates
- Renumber Nodes
- Update IDs

Projections

- Define Projection
- Project
- Transform

Topology

- Build
- Clean
- Create Labels
- VPF Tile Topology

General

- Create Coverage
- Tolerance

ArcInfo Workstation

- Full featured management and analysis environment for ArcInfo Coverage data format
- ARC Macro Language (AML[™]) scripting environment
- Cross platform environment

Corporate Headquarters

ESRI 380 New York Street Redlands, California 92373-8100, USA Telephone: 909-793-2853 Fax: 909-793-5953

For more information, call ESRI at **1-800-447-9778.**

Send e-mail inquiries to **info@esri.com**. Visit ESRI's Web page at **www.esri.com**.

Outside the United States, contact your local ESRI distributor. For the number of your distributor, call ESRI at **909-793-2853**, ext. **1-1235**.

Copyright © 2004 ESRI. All rights reserved. ESRI, the ESRI globe logo, ArcReader, ArcView, ArcEditor, ArcInfo, ModelBuilder, ArcToolbox, PC ARC/INFO, ArcIMS, Geography Network, ArcCIS, AML, @esri.com, and www.esri.com are trademarks, registered trademarks, or service marks of ESRI in the United States, the European Community, or certain other jurisdicions. Other companies and products mentioned herein are trademarks or registered trademarks of their respective trademark owners.

G14094 11/04sf