

# Fairfax Permits

## Site & Entrance Permits – Point Files

### METHOD #1 – POINT FILE

#### 1. GIS REQUIREMENT:

- a) Submit a GIS or CAD file showing the proposed work location. This is a “single point drawing” indicating the location of your project. **Note: It is not a digital version of your plan/drawing sheets.**
- b) Media type: CD or DVD in Windows format
- c) File Types:
  - ESRI shapefile (**preferred**). Include the SHP, DBF, SHX, and PRJ files.
  - Google Earth KML files (not KMZ)
  - DWG files
- d) All DWG files must be **internally geo-referenced** to:
  - Virginia State Plane Coordinate System (i.e., not Latitude/Longitude)
  - North Zone
  - Datum: NAD1983
  - Units: U.S. Survey Feet

The easiest way to **geo-referenced** CAD data is to start with **geo-referenced** streets. See Section 3 for information on Street layer files.

#### 2. HOW TO MEET THIS GIS REQUIREMENT:

It is easiest to meet the requirement by drawing your point over top of street data which is already **geo-referenced** to the specified coordinate system.

The basic steps are:

- Load the street data into your GIS or CAD software
- Zoom to your work location
- Create New Shapefile or new DWG layer
  - Draw your point
- Save that point and put the associated files on a CD/DVD.
- Label your disk with the name of your file. Submit it with your Permit Application.

If using Google Earth:

- Find your location
- Click “Add Placemark” (for Site & Entrance line permits)
  - Give it a Name
  - Draw your point
- In your Places list, find your newly created point. Right-click it and choose Save Place As.
- Change the Save As Type to “KML”
- Save it, and copy it to CD/DVD for submission

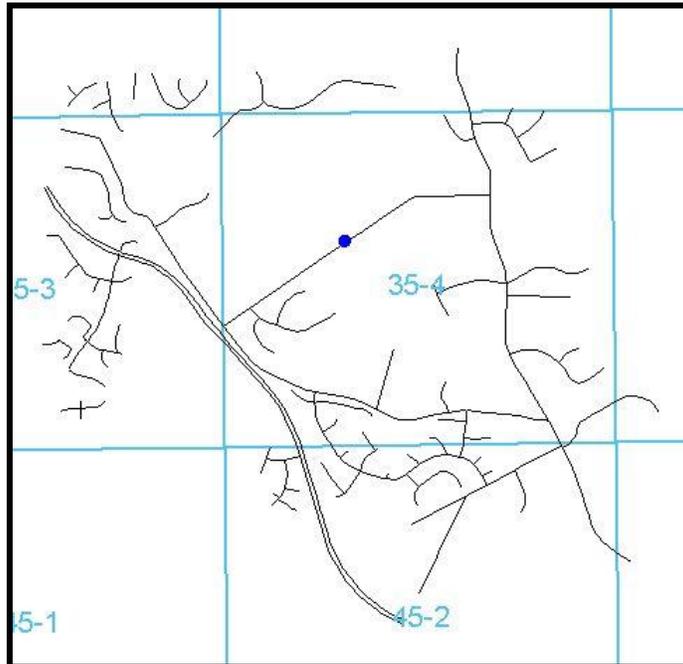


Figure 1; The “dot” is what should be delivered to VDOT.

## METHOD 2 – TEXT FILE

- a) Submit a text file (.txt) with a coordinate indicating the location of your project.
- b) File Type: .txt format, created in “Notepad”. See example below.
- c) All coordinates must be in:
  - Virginia State Plane Coordinate System (i.e., not Latitude/Longitude)
  - North Zone
  - Datum: NAD1983
  - Units: U.S. Survey Feet.

## INSTRUCTIONS

**This method is beneficial for those with CAD programs for their surveying and design functions, who don’t wish to purchase GIS data or software. It assumes that the coordinate of the work site is already known from prior surveys and design work.**

- a) Using a text editor such as Notepad, create a text file with two lines in it. The first line is the “header” line, and the second is the “coordinate” line.
- b) Give each coordinate the ID of “1” as in the example.

### Example:

ID,X,Y	(no spaces between characters or commas)
1,11852647,6987291	(no spaces between numbers)

- c) Save this as a .txt file in Notepad (ex. Job123.TXT)
- d) Put this file on diskette and provide to VDOT with your permit application.
- e) Label your diskette with the name of your file and the file extension .TXT

### **3. STREET DATA**

Street data is available from two sources, Fairfax County GIS Division, and VDOT's website.

You can obtain GIS street data from the Fairfax County GIS Office for \$25 (<http://www.co.fairfax.va.us/maps/cd.htm>). This data contains street names (as attributes) which makes it easy to find your work locations. Other useful layers are included on this disk including Tax Map Grids. The data format is an ESRI GeoDatabase or shapefile.

VDOT also has street data in SHP and DXF formats for downloading at this location:

<http://www.virginiadot.org/business/fairfax-permits-main.asp>

Only Route Numbers are shown, not Street Names.

*Contact Larry Camp in VDOT's Northern Virginia District GIS Section if you have any questions: [larry.camp@vdot.virginia.gov](mailto:larry.camp@vdot.virginia.gov)  
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