Functional Classification Review and Update, 2024

Methodology

The process below summarizes VDOT's methodology for reviewing and updating the existing functional classification of Virginia roadways.

Project Setup (completed)

- Compiled data to be used for the purposes of reviewing existing Functional Classification (FC) and proposing changes including:
  - Existing FC (from 2014)
  - Updated version of the roadway Geometry (VDOT Linear Referencing System (LRS) Linework) – Roadway geometry will be updated using the latest LRS releases (2023, 2024). This may capture some roadway issues such as missing ramps, new roadways, etc.
  - 2011 and 2019 traffic volumes (and calculated percent change)
  - Roadway attribute data such as width, shoulder, speed limit, etc.
- Migrated existing FC data onto latest LRS geometry
- Set up Enterprise GIS editing environment to allow multiple editors

FC Review and Edit (completed)

- Reviewed existing FC dataset for gaps, inconsistencies, or errors
  - Proposed FC changes for these issues which mostly consisted of ramps, connections between existing classified roadways, and single unclassified sides of divided roadways
  - These proposed changes are present in the "Proposed FC Changes (ALL)" GIS layer
- Identified roads where potential FC changes were less clear than the examples in the previous step and flagged them for review by the districts
  - Proposed FC changes based on roadway characteristics, volumes, and FC of surrounding roadways
  - These proposed changes are present in the "Proposed FC Changes (for Review)" GIS layer
- Reviewed roadways associated with known Capacity Expansion projects from 2014 through 2027 as well as nearby roadways likely to be affected by those projects for changes in FC
  - Identified associated project UPCs and reviewed project scopes
  - Proposed FC changes based on completed or pending capacity expansion projects
  - Those proposed changes are present in the "Proposed FC Changes (Capacity Expansion)" GIS layer

Local Review (current phase)

Web maps are available for review and contain proposed changes as well as the existing FC. Comments can be made via email referring to a feature's "FID" to identify road segment location. Users may wish to turn layers on and off and click on features to view attributes in order to see all the information clearly. Not all districts will have all the layers listed below (eg: if there are no capacity expansion-based changes in the district, the "Proposed Changes (Capacity Expansion)" layer will not be present.) Available layers and instructions on how to review them are as follows:

- Proposed FC Changes (All)
    - This layer contains all the proposed functional classification changes to the VDOT LRS for 2024
    - New or future roads that need to be added to the LRS do not exist in this layer
- Proposed FC Changes (Capacity Expansion)
    - These are proposed changes that are based on capacity expansion projects
    - Any new roads will be classified and added to the Functional Classification data as they are updated in the VDOT LRS
- FC Prime, FC Non Prime, FC Ramps
    - These are existing Functional Classifications (as of 2023) and act as reference layers

Web Map Review: How-To

1. Open the web map for your district from the links below:

    NOVA: https://arcg.is/104LCv0

    Staunton: https://arcg.is/yzrrL1

    Culpeper: https://arcg.is/1Dje8P0

    Fredericksburg: https://arcg.is/11HOOu

    Hampton Roads: https://arcg.is/1efy1a2

    Richmond: https://arcg.is/1iX0PT0

    Lynchburg: https://arcg.is/0SLDjn1

    Salem: https://arcg.is/0rLP5T1

    Bristol: https://arcg.is/1DmWnz

2. Click on the Content tab at the top left of the page. Use the check boxes to the left of each layer to turn layers on or off
3. Click on the Legend tab at the top left of the page to view the legend
4. Clicking on a Proposed FC or Proposed Capacity Expansion FC feature in the map will open a pop-up window with more information.
5. In the pop-up window you will see the proposed FC and the attributes defined below:

FID: ID number to be used to identify features you wish to discuss with VDOT

Existing FC: Existing functional classification number

FC Name: Existing functional classification name

FC_Propsed: Proposed functional classification

Change Reason: Reason for proposed change

Comment: Any additional comments. VDOT Project UPCs are in this column for the Capacity Expansion layer

*Be aware that Roadway geometry will be updated using the latest LRS releases (2023, 2024). This may capture some roadway issues such as missing ramps, new roadways, etc. Your review should focus on the classification of roadways that are on the map.

6. Note the FID of any proposed changes that you disagree with or wish to discuss further and send them with your comments to **Chris.Detmer@VDOT.Virginia.gov** and **Carrie.Saunders@vdot.virginia.gov**