USGS quad map locator tool

scan QR code or go to https://oskvig.github.io/locator/

Finding your map

1. Scan QR code or enter URL to access the locator tool
2. Look at the GPS coordinates you wish to map, and identify their format
   - Decimal degrees (DD) looks like this:
     - 40.348644, -74.658419
   - Degrees decimal minutes (DDM) can look like any of these:
     - 40°20.897700', -74°39.499020'
     - 40 20.897700, -74 39.499020
     - 40°20.897700' N, 74°39.499020' W
     - N 40°20.897700', E -74°39.499020'
   - Other coordinate formats (e.g. DMS) are not supported by this tool
3. Enter your coordinates in the correct section of the tool (DD or DDM)
   - Enter only numbers and decimal points
     - Do not include minuses (-), degree symbols (°), apostrophes ('), or letters (N, S, E, W)
   - For DD format, paste or type the entire set into the input box
   - For DDM format, the first two or three numbers are your degrees (e.g. 40 or 74), and the rest of the numbers are your minutes (e.g. 20.897700 or 39.499020)
4. Press "Get maps," scroll down a bit, and wait up to 30 seconds for results to appear
   - Results will appear immediately below the DDM input boxes
   - Under "Map" you will find a direct download link to the quad map that covers your coordinates
   - Under "Adjacent Maps" you will find direct download links to all 8 quad maps bordering the map which covers your coordinates

Importing your map into Avenza

5. Long-press the link to the map you want, and copy the URL address
6. Open the Avenza app, and navigate to any folder where you wish to store the new map
7. Add the map to Avenza by following these steps:
   - Go to the "My Maps" tab, and open the specific folder where you wish to store the map
   - Press the plus sign (+) [located in the top right of the home screen for iPhone, bottom left for Android]
   - Press "Import a map" (iPhone) or "Download or import a map" (Android)
   - Press "From the Web" (iPhone), or "Web resource" (Android)
   - Paste the URL address and press "OK"
   - The new quad map will download into your Avenza folder and remain available for offline use
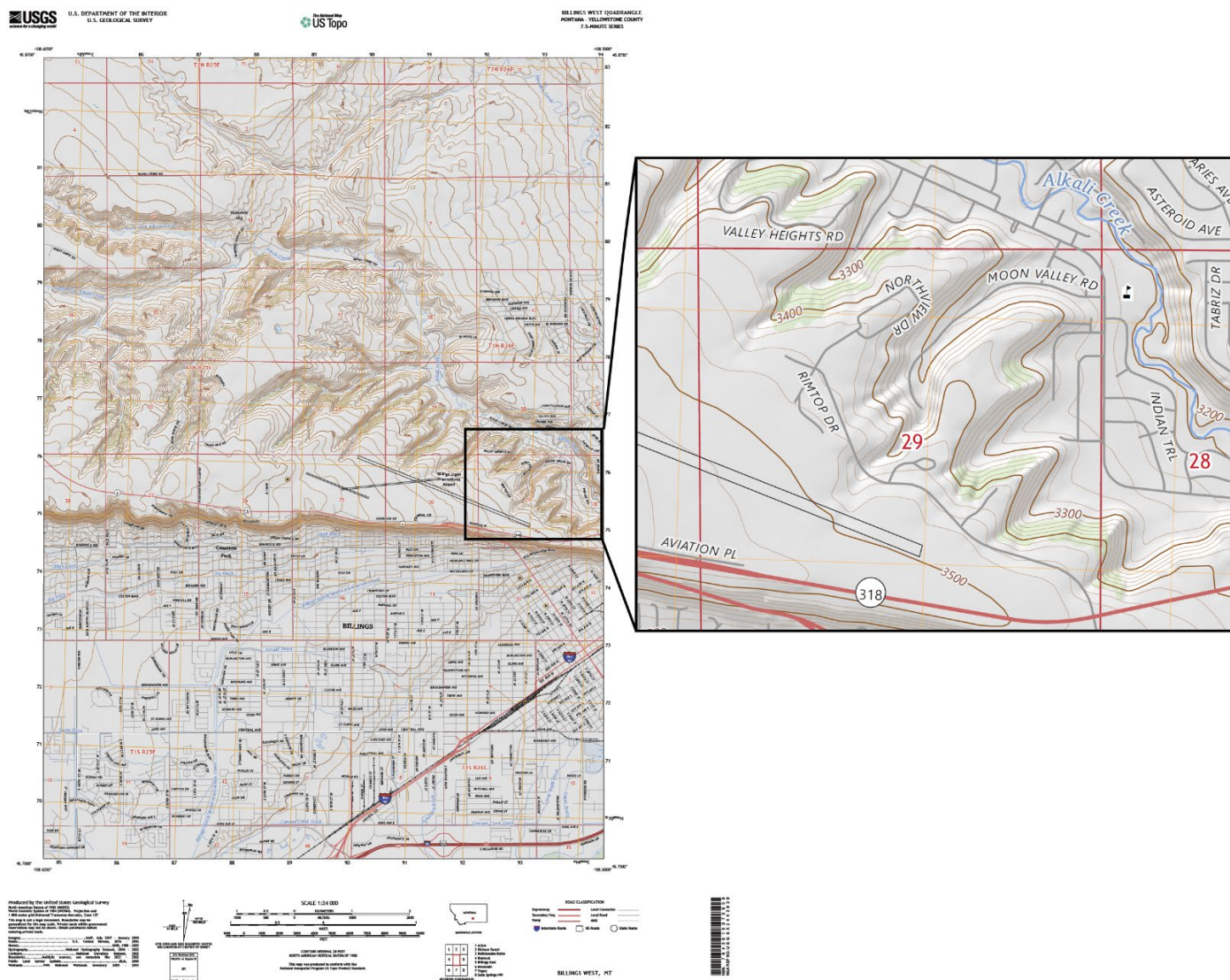
Figure 1: a USGS 7.5-minute quad map, with PLSS and shaded relief enabled (plus zoomed inset to show detail)*

About USGS quad maps and this tool

USGS 7.5-minute quadrangle maps are the gold standard of detailed topgraphic maps in the United States. These maps cover the entire country, in swatches of roughly 40 square miles per map. Quad maps are made available free of charge by the USGS, but the browsing and downloading interface is not very quick or mobile-friendly, and the state of Montana alone is divided into over 3,000 separate maps. For these reasons, it is difficult both to pinpoint and to obtain the specific quad map that covers any given location.

This quad map locator tool is intended to make it quick and easy to find and download quad maps on a mobile phone, and to load them into Avenza for offline viewing, waypointing, and route tracking. The primary intended use case is wildland firefighting operations, especially initial attack. Please post all feedback and error reports on the github repository (https://github.com/oskvig/USGS-quad-map-locator).

*Quad maps contain three optional layers that are disabled and invisible by default, but may be viewed in a robust PDF viewer like Xodo or Acrobat DC. These layers are satellite imagery, PLSS (i.e. township, range, and section), and shaded relief.