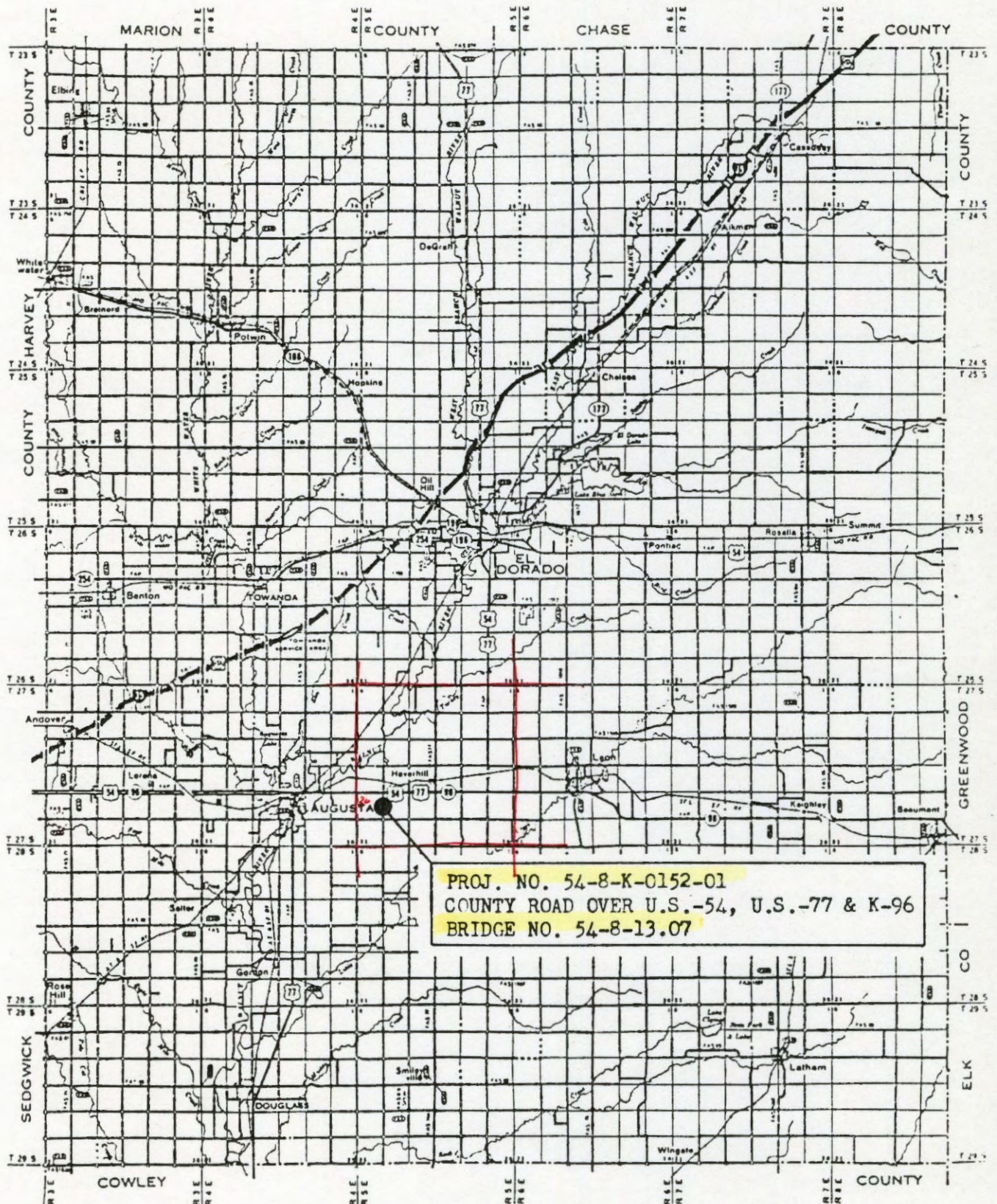




SE-NE-30-27S-5E

0-55'

chase

Gage shale to Fort Riley Ls



# GENERAL HIGHWAY MAP BUTLER COUNTY KANSAS

APPROVED BY THE  
STATE HIGHWAY COMMISSION OF KANSAS  
DEPARTMENT OF PLANNING AND DEVELOPMENT  
U. S. DEPARTMENT OF TRANSPORTATION  
FEDERAL HIGHWAY ADMINISTRATION





Core and Sample  
Description

Proj. 54-8 K 0152 - 01  
Br. No. 13.07 - Butler Co.  
CD #4 Sta. 49+14<sup>5</sup> R+ 20

|                |                                                                                                          |                    |                                 |
|----------------|----------------------------------------------------------------------------------------------------------|--------------------|---------------------------------|
| Core 1         | Cut 5°                                                                                                   | Rec 3 <sup>8</sup> |                                 |
| 0 <sup>8</sup> | Shale, maroon, silty                                                                                     |                    |                                 |
| 1 <sup>2</sup> | Shale, green                                                                                             |                    |                                 |
| 1 <sup>8</sup> | Shale, maroon                                                                                            |                    |                                 |
| 3 <sup>8</sup> | Total Recovery                                                                                           |                    |                                 |
|                | Elev.                                                                                                    | Tons/S.F.          | description                     |
| Sample 1       | 1308.0 to 1307.6                                                                                         | 2.4                | shale, green                    |
| " 2            | 1305.0 to 1304.6                                                                                         | 8.1                | shale, maroon                   |
| Core 2         | Cut 2 <sup>6</sup>                                                                                       | Rec 2 <sup>6</sup> |                                 |
| 2 <sup>6</sup> | Shale, maroon, silty with some minor green zones fractured and sheared, fairly good shale, but no sample |                    |                                 |
| 2 <sup>6</sup> | Total Recovery                                                                                           |                    |                                 |
| Core 3         | Cut 5°                                                                                                   | Rec 4°             |                                 |
| 3 <sup>2</sup> | Shale, maroon, silty, some hard siltstone zones, some H <sub>2</sub> O carrying                          |                    |                                 |
| 0 <sup>8</sup> | Shale, maroon and silty                                                                                  |                    |                                 |
| 4°             | Total Recovery                                                                                           |                    |                                 |
|                | Elev.                                                                                                    | Tons/S.F.          | description                     |
| Sample 3       | 1298.2 to 1297.3                                                                                         | 0.7                | shale, maroon and silty         |
| Core 4         | Cut 4°                                                                                                   | Rec 4 <sup>5</sup> |                                 |
| 4 <sup>5</sup> | Shale, maroon, silty and clayey with some green zones                                                    |                    |                                 |
| 4 <sup>5</sup> | Total Recovery                                                                                           |                    |                                 |
|                | Elev.                                                                                                    | Tons/S.F.          | description                     |
| Sample 4       | 1295.8 to 1295.1                                                                                         | 1.1                | shale, maroon, clayey and silty |
| " 5            | 1292.7 to 1292.1                                                                                         | 7.1                | " " and silty                   |

Core and Sample  
Description

Proj. 54-8-K-0152-01  
Br. No. 13.07-Butler Co.  
CD #4 Sta. 49+14<sup>5</sup> Rt 20

|                |                                           |         |
|----------------|-------------------------------------------|---------|
| Core 5         | Cut 5°                                    | Rec. 5° |
| 1 <sup>2</sup> | Shale maroon, silty with some gray-green  |         |
| 2 <sup>4</sup> | Shale, gray, limy                         |         |
| 1 <sup>4</sup> | Shale, green, clayey with some limy zones |         |
| 5°             | Total Recovery                            |         |

|          | Elev.            | Tons/S.F. | description                               |
|----------|------------------|-----------|-------------------------------------------|
| Sample 6 | 1287.6 to 1287.0 | 1.0       | Shale, green, clayey with some limy zones |