

City of Dunnellon
Agenda Summary Form

Meeting Date: February 9, 2022

1. Responsible Department: Roads & Streets
2. Presenter: Troy Slattery
3. Recommended Action: Authorize the Mayor to sign Kimley Horn IPO No. 100 – Agreement #AGR2022-05 Roadway Condition Assessment - \$45,600

Subject: Kimley Horn IPO #100 for Roadway Condition Assessment Agreement #AGR2022-05

Request for Approval Summary Explanation & Background:

IPO #100 provides for the preparation of a roadway condition assessment to prioritize the roadway restoration efforts of City owned and maintained streets.

Procurement Method: Contracted City Engineer

Fiscal Information: 100% grant funded through DEO Grant Agreement AGR#2021-15

Attorney Review: N/A

INDIVIDUAL PROJECT ORDER NUMBER 100

Describing a specific agreement between Kimley-Horn and Associates, Inc. (the “Engineer” or “Kimley-Horn”), and the City of Dunnellon (the “City” or “Client”) in accordance with the terms of the Master Agreement for Continuing Professional Services dated November 9, 2009, which is incorporated herein by reference.

Identification of Project:

Project: Roadway Condition Assessment

Client: City of Dunnellon

Project Manager: Chris Towne

Background Information:

The City of Dunnellon has determined that a roadway condition assessment is necessary to prioritize the roadway restoration efforts of City owned and maintained streets. This assessment would need to quantify the condition of the existing roadways based on a visual inspection. The City currently owns and maintains approximately 15 miles of paved roads.

The proposed assessment includes data collection by Kimley-Horn and data processing by our subconsultant, RoadBotics. Video imagery will be collected and analyzed to provide pavement condition information on a simplified scale of 1 (good condition) to 5 (poor condition). Pavement condition ratings will be used to develop pavement maintenance and repair recommendations and identify pavement areas requiring immediate attention. In response to this identified need, Kimley-Horn has prepared the following scope.

Scope of Services**Task 1 – Network Definition**

- A. Kimley-Horn will coordinate with the City and RoadBotics to define the extent of the pavement network, which we estimate at 15 centerline miles. The pavement network and linear segmentation will be defined in GIS and used for efficient field navigation during data collection.
- B. Kimley-Horn will finalize the network definition map with the City and deliver hard copy and digital exhibits capturing the scope of the assessment.
- C. City will provide all existing maps of the existing City paved roads and any previous pavement condition assessments performed. Maps are to be provided in GIS format to the greatest extent possible. Kimley-Horn shall be entitled to rely on the completeness and accuracy of all information provided by the City.

Task 2 – Pavement Evaluation

- A. Kimley-Horn will collect pavement condition data using a windshield-mounted smartphone to capture georeferenced imagery of the pavement. Data collection will occur in dry conditions during daylight hours.
- B. Following collection, Kimley-Horn will upload video files to RoadBotics for image analysis and quality review. This analysis will result in condition ratings and imagery at 10-ft intervals along the City’s roadways. Ratings will be delivered on a scale of 1 (good condition) to 5 (poor condition) in

GIS shapefile and tabular formats. The City will also have access to this data via Kimley-Horn's RoadWay enterprise license with RoadBotics.

- C. Kimley-Horn will field verify the results of the georeferenced imagery analysis by performing a field evaluation on select 10-foot segments of the City's roadways. The field evaluation will be performed to aid in the determination of the pavement rehabilitation method and will be limited to a total of 50 of the 10-foot segments. Kimley-Horn will coordinate the location of the 50 segments to be evaluated with City Staff.
- D. Kimley-Horn will recommend a pavement rehabilitation method and program year based on the condition rating, available funding, and City staff input. The pavement rehabilitation method will be based on the following criteria:
 - 1) Roadways receiving a condition rating of 5 will likely require full reconstruction.
 - 2) Roadways receiving a condition rating of 4 will likely require reclamation.
 - 3) Roadways receiving a condition rating of 3 will likely require milling and resurfacing.
 - 4) Roadways receiving a condition rating of 2 will likely require asphalt overlay.
 - 5) Roadways receiving a condition rating of 1 will likely not require rehabilitative measures.

Task 3 – Roadway Condition Assessment Technical Memo

- A. Kimley-Horn will prepare a GIS map illustrating the program year and recommended rehabilitation type for the evaluated roads.
- B. Kimley-Horn will prepare up to 4 typical sections illustrating the various rehabilitation methods recommended with a preliminary opinion of probable construction cost per section for budgeting purposes.
- C. Kimley-Horn will prepare a brief technical memo that will detail the methodology and findings of the roadway condition assessment. The technical memo will include the extent of centerline miles evaluated, the aggregate condition of the network provided by Roadbotics, and instructions for accessing the data via Kimley-Horn's Roadway enterprise license.

Additional Services

Any services not specifically provided for in the above scope will be billed as additional services and performed at our then current hourly rates. Additional services that can be provided include, but are not limited to, the following:

- 1. Evaluation of roadways in excess of 15 miles
- 2. Pavement Condition Index (PCI) surveys according to ASTM D6433.
- 3. Budget analysis
- 4. Maintenance policy and pavement management system development
- 5. Pavement condition forecasting
- 6. Survey, Pavement Design, Bidding, and Construction Administrative Services

7. Geotechnical testing and Non-Destructive pavement testing and evaluation
8. Any meeting, task or service not specifically described in the above Scope of Services.

Schedule

Kimley-Horn will begin working on the project 2 weeks from notice to proceed and will complete the scope detailed herein within 60 days of notice to proceed.

Method of Compensation:

Kimley-Horn will complete the above scope of services for the lump sum fee of \$45,600 as detailed below, inclusive of office overhead expenses. A breakdown of fee by task is as follows:

<i>Task Description</i>	<i>Lump Sum Fee</i>
Task 1 - Network Definition	\$11,100
Task 2 - Pavement Evaluation	\$14,500
Task 3 - Roadway Condition Assessment Technical Memo	\$20,000
Total Authorized Amount	\$45,600


All permitting, application, and similar project fees will be paid directly by the Client. Should the Client request Kimley-Horn to advance any such project fees on the Client's behalf, a separate invoice for such fees, with a fifteen percent (15%) markup, will be immediately issued to and paid by the Client.

Lump sum fees will be invoiced monthly based upon the overall percentage of services performed. Payment will be due within 25 days of your receipt of the invoice and should include the invoice number and Kimley-Horn project number.

ACCEPTED BY:
CITY OF DUNNELLON

KIMLEY-HORN AND ASSOCIATES, INC.

BY: _____

BY: 
Alan J. Garri, PE – Assistant Secretary

TITLE: _____

BY: 
Chris Towne, PE – Project Manager

DATE: _____

DATE: January 28, 2022

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