US 34 & MacGregor Avenue
Intersection Improvements
Open House
December 5, 2018
Agenda

• Welcome / Introductions
• Short Presentation
• Questions / Answers
• Allow Time to View Exhibits
• Opportunity to Provide Comments
Project Overview and Background

• Intersection identified as candidate for improvements due to operational and safety concerns

• CDOT conducted an Intersection Treatment Study to identify possible improvements

• Project is funded for construction in the Winter/Spring of 2020
Project Overview and Background

To Rocky Mountain National Park

To Central Business District

US 34/Wonderview Ave

Pedestrian activity/future trail
Project Overview and Background

Missing sidewalk connections
Purpose and Goals

• Improve the intersection to
  – Accommodate traffic volumes now and in the future
  – Improve safety for vehicles, pedestrians, cyclists, and other users
  – Provide cost savings when considering construction, maintenance, traveler delay, and crashes
Options Considered

- Avoid right-of-way impacts
- Consider all modes of transportation
- Involve the community
Options Considered

- **No-Action** – Leave intersection as a two-way stop control
- **Build Option #1** – Make the intersection a four-way stop
- **Build Option #2** – Install a traffic control signal
- **Build Option #3** – Construct a roundabout
Intersection Treatment Study

- Evaluated each option to determine which one did the best job at addressing the project goals
  - Operations – How well will the intersection process vehicles (delay)
  - Safety – Will the option reduce conflicts and crashes
  - Costs – Which option will lower costs over the next 20-years (expected life-cycle)
Results - Two-way stop

• Very high delay for drivers (especially on MacGregor Avenue)
• Will not reduce the number of conflict points
• Highest number of expected crashes
• Highest overall costs
Results - Four-way stop

• Operations not much better than a two-way stop
• Will not reduce the number of conflict points
• Will do a good job are reducing crashes
• Cost would be high (lower than two-way stop)
Results - Traffic signal

• Operations would be much better than either stop option

• Will not reduce the number of conflict points

• Will not reduce crashes as well as the four-way stop

• Cost would be lower than the two stop options
Results - Roundabout

• Will have the best operations for all vehicles
• Will have the lowest number of conflict points
• Will have the lowest number of expected crashes
• Will have the lowest costs over the next 20-years
Next Steps/Critical Issues

• Move forward with design of roundabout
• Address driveway access
• Incorporate best practices to accommodate pedestrians/cyclists
• Fill in missing sidewalk connectivity
• Accommodate snow removal equipment and storage
• Minimize design while accommodating proper design vehicle size
Preliminary Design Option 1

Maintain driveway in corner of intersection

Consider safety for pedestrians

Connect sidewalk
Preliminary Design Option 2

Realign driveway to Willowstone Drive
Project Schedule

- **Data Collection and Intersection Study**
- **Preliminary Design**
- **Engineering and Design**
- **Project Advertisement**
- **Construction**

**2018**
- WE ARE HERE
- Public Open House #1

**2019**
- Public Open House #2

**2020**
- Anticipated Project Completion
Questions