

# Downtown to Riverfront in Keokuk, Iowa



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## Project Scope

The city of Keokuk wanted a direct connection from their downtown to the historic Union Depot. This was done by creating trails through the area highlighted in the figures below. Other amenities included in the design plan are dog park facilities in Riverview Park, a restroom structure with a storm shelter, a gazebo with a viewing deck, as well as a parking lot to serve both the park and the Union Depot.

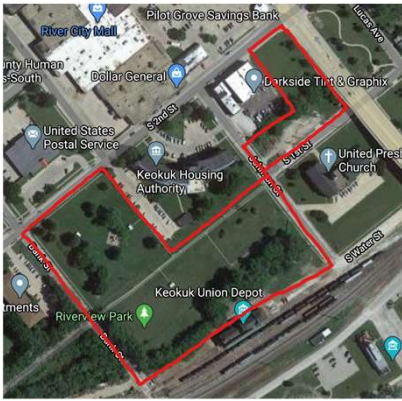


Figure 1. Location of the project in Keokuk, Iowa

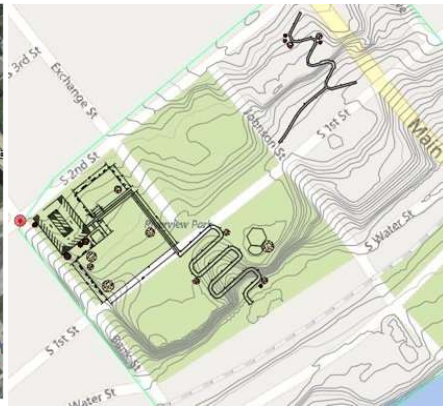


Figure 2. Site plan of Trails and Amenities

## Design of Property Amenities

AutoCAD Civil 3D was used to design all the trails for the site, our site design, the floor plan of the restroom structure, and parking lot design. Revit was used to create 3D models of both the restroom structure with the storm shelter as well as gazebo with the viewing deck.



Figure 3. Site plan with the dog parks, parking lot, and structure footprint.

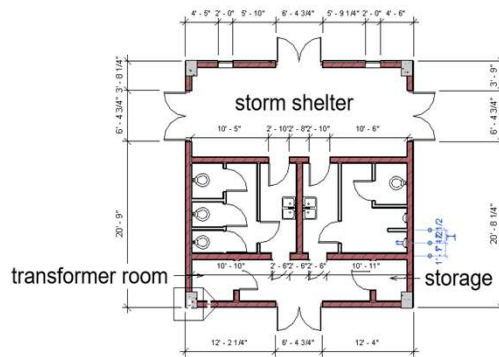


Figure 4. Floor plan of the restroom structure.

## Final Designs

The figures below are the final designs of the Downtown to Riverfront Project.

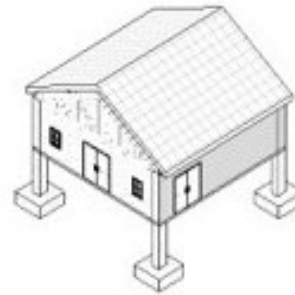


Figure 5. Restroom and Storm Shelter Structure



Figure 6. Gazebo Structure with Viewing Deck

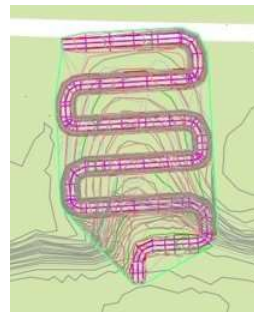


Figure 6. Union Depot Trail



Figure 7. Highway Trail

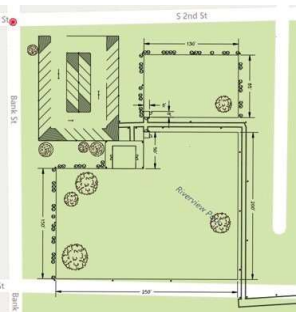


Figure 8. Dog Parks with Connecting Trail

## Final Notes

Both trails that are switchback trails were designed to meet ADA requirements for slope. The large and small dog parks were sized with recommended areas per each park. The structure with the restroom and storm shelter meet all qualifications of a storm shelter in Iowa. The gazebo will have seating and a viewing area with scopes facing the river. A cost analysis for the project was done and the final project cost was found to be \$367,000.

## References

- RSmeans, <https://www.rsmeansonline.com/ManageEstimate>
- ICC 500 Storm Shelter Design Code, [https://codes.iccsafe.org/content/ICC5002014?site\\_type=public](https://codes.iccsafe.org/content/ICC5002014?site_type=public)
- ADA Accessibility Guidelines, <https://www.americantrails.org/images/documents/TN-trail-ada.pdf>