

#### DESIGN COMMISSION MONDAY, FEBRUARY 22, 2016 6:00 PM AUSTIN CITY HALL, BOARDS AND COMMISSIONS ROOM 1101 301 W. SECOND STREET, AUSTIN, TEXAS 78701

#### **Current Commission Members**

Evan Taniguchi – Chair	Martha Gonzales
Bart Whatley – Vice-Chair	Connor Kenny
David Carroll	Ben Luckens
Aan Coleman	Melissa Henao-Robledo
Samuel Franco	Heyden Walker

\_\_\_\_\_ Jorge E. Rousselin (COA – PZD) Executive Liaison

#### AGENDA

Please note: Posted times are for time-keeping purposes only. The Commission may take any item(s) out of order and no express guarantee is given that any item(s) will be taken in order or at the time posted.

-		Approx. time
CA	LL TO ORDER AND ROLL CALL	6:00 PM
1.	CITIZEN COMMUNICATION: GENERAL	6:00 PM
	The first five speakers signed up prior to the meeting being called to order will each be	
allowed a three-minute allotment to address their concerns regarding items not posted		
	on the agenda.	
2.	APPROVAL OF MINUTES (Discussion and Possible Action): None	6:15 PM
3.	NEW BUSINESS (Discussion and Possible Action):	6:15 PM
	a. Discussion and possible action on the Montopolis Water Reclamation Initiative	
	Storage Reservoir and Pump Station design development submittal located at 2711	
	Montopolis Dr. seeking support for the project. (Shwetha Pandurangi, P.E., COA-AW).	
4.	OLD BUSINESS (Discussion and Possible Action):	6:45 PM
	a. Discussion and possible action on creation of Infrastructure Guidelines.	

5. COMMITTEE AND LIAISON REPORTS (Discussion and Possible Action):	7:15 PM
a. Standing Committees Reports;	
b. Working Group Reports;	
c. Liaison Reports; and	
d. Appointment of Committee/Working Group members by Chair.	
6. STAFF BRIEFINGS: None	7:25PM
7. FUTURE AGENDA ITEMS:	7:25 PM
a. March 2016 meeting: Subchapter E and Parks Briefing	
8. ANNOUNCEMENTS:	7:30 PM
a. Chair Announcements;	
b. Items from Commission Members; and	
c. Items from City Staff: CodeNEXT Sound Check Report	
ADJOURNMENT	7:30 PM

The City of Austin is committed to compliance with the American with Disabilities Act. Reasonable modifications and equal access to communications will be provided upon request. Meeting locations are planned with wheelchair access. If requiring Sign Language Interpreters or alternative formats, please give notice at least 2 days before the meeting date. Please contact Jorge Rousselin in the Planning and Zoning Department, at jorge.rousselin@austintexas.gov or (512) 974-2975, for additional information. TTY users route through Relay Texas at 711.

#### Design Commission Committees, Working Groups, and Liaisons

#### **Committees**

1. Executive Committee: E. Taniguchi, B. Whatley, H. Walker

#### Working Groups

- 1. Planning and Urban Design Working Group: E. Taniguchi, H. Walker, B. Whatley, A. Coleman
- 2. Architecture and Development Working Group: B. Whatley, M. Gonzalez, D. Carroll
- 3. Landscape and Infrastructure Working Group: S. Franco, M. Henao-Robledo, A. Coleman, B. Luckens
- 4. Public Engagement Working Group: B. Luckens, S. Franco, M. Henao-Robledo

#### **Design Commission Liaisons**

- 1. Downtown Comm. Liaison / Downtown Austin Plan: Samuel Franco
- 2. Airport Boulevard Redevelopment Initiative: Pending

#### **Design Commission Executive Liaison:**

Jorge E. Rousselin, CNU-A Development Services Process Coordinator Urban Design, Planning and Zoning Department City of Austin, One Texas Center, 505 Barton Springs Rd., Austin, TX 78704 Phone: (512) 974-2975 ■ E-mail: jorge.rousselin@austintexas.gov

#### **Resources:**

- 1. The Urban Design Guidelines for Austin can be accessed here: <u>Urban Design Guidelines for Austin</u>.
- 2. Design Commission backup may be accessed here: Design Commission Backup.



#### City of Austin Design Commission – Project Submittal Consideration Sheet

Project Name: Montopolis Water Reclamation Initiative Storage Reservoir and Pump Station		
Project Location/Address:		
2711 Montopolis Dr		
Applicant:	Property Owner:	
City of Austin	City of Austin	
Mailing Address:	Mailing Address:	
625 E 10th Street	Suite 100	
512 974 3514	Phone Number:	
Project Architect/Engineer:	Project Start Date:	Project End Date:
CH2M Hill	August 2016	January 2018
Mailing Address:	Phone Number:	
Is project subject to redevelopment site	Anticipated Dates of Ac	tion
	Planning Commission:	April 2016
Yes No 🗸	City Council:	May 2016
attach or add additional page(s) as necessar	cluding entitlements that y) :	you are seeking;
attach or add additional page(s) as necessary) :The Montopolis WRI storage reservoir is planned to be a ground storage tank with a storage capacity of about four (4) million gallons (MG) and is planned to be approximately 130 feet (ft) in diameter and 45 ft in height. It will store the treated and filtered wastewater effluent (reclaimed water) prior to transport for beneficial reuse applications. This reservoir is important to the function of the reclaimed water system south of the Colorado River. It will backfeed into the Central Low Service Area and provide reliability to that part of the reclaimed water system. It 		
Current Status of Submittal:		
Conceptual Schema	atic 🗾 Do	esign Development
Do you have a copy of the Urban Design Guidelines for Austin? Yes   If not, please see: <a href="http://www.ci.austin.tx.us/downtown/downloads/urban_design_guidelines_for_austin.pdf">http://www.ci.austin.tx.us/downtown/downloads/urban_design_guidelines_for_austin.pdf</a>		
Please fill in the subsequent information on the following pages.		



Relate the project to applicable items addressed in the Urban Design Guidelines for Austin. For an explanation of each guideline, please review the document at: <u>http://www.ci.austin.tx.us/downtown/downloads/urban\_design\_guidelines\_for\_austin.pdf</u>

#### ALTERNATIVE EQUIVALENT COMPLIANCE (AEC)

Is AEC being requested for this project?

Yes

No

If yes, please explain nature of request including alternatives offered and entitlements sought. Attach additional page if necessary.

#### AREA WIDE GUIDELINES

#### 1. Create dense development

\_\_\_\_\_incorporated,

\_\_\_\_need input,



#### 2. Create mixed-use development



need input,

	N/A
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3. Limit development which closes downtown streets			
incorporated,	need input,	✓ N/A	
4. Buffer neighborhood	ledges		
incorporated,	need input,	N/A	
5. Incorporate civic art	in both public and p	rivate development	
incorporated,	need input,	N/A	
6. Protect important pu	blic views		
incorporated,	need input,	N/A	
7. Avoid historical misi	representations		
incorporated,	need input,	✓ N/A	
8. Respect adjacent his	storic buildings		
incorporated,	need input,	✓ N/A	
9. Acknowledge that rooftops are seen from other buildings and the street			
incorporated,	need input,	N/A	
10. Avoid the development of theme environments			
incorporated,	need input,	N/A	
11. Recycle existing building stock			
incorporated,	need input,	✓N/A	

### **GUIDELINES FOR THE PUBLIC STREETSCAPE**

1. Protect the pedestrian where the building meets the street			
incorporated,	need input,	N/A	
2. Minimize curb cuts	5		
incorporated,	need input,	N/A	
3. Create a potential	for two-way streets		
incorporated,	need input,	N/A	
4. Reinforce pedestri	ian activity		
incorporated,	need input,	<b>√</b> N/A	
5. Enhance key trans	sit stops		
incorporated,	need input,	<b>√</b> N/A	
6. Enhance the stree	tscape		
incorporated,	<b>I</b> need input,	N/A	
7. Avoid conflicts between pedestrians and utility equipment			
incorporated,	need input,	N/A	
8. Install street trees			
incorporated,	<b>I</b> need input,	N/A	
9. Provide pedestrian-scaled lighting			
incorporated,	need input,	N/A	
10. Provide protection from cars/promote curbside parking			
incorporated,	need input,	<b>√</b> N/A	

11. Screen mechanical and utility equipment			
incorporated,	need input,	N/A	
12. Provide generous s	treet-level windows		
incorporated,	need input,	<b>√</b> N/A	
13. Install pedestrian-fr	iendly materials at s	treet level	
incorporated,	need input,	✓N/A	
GUIDELINES FOR PL	AZAS AND OPEN S	SPACE	
1. Treat the four square	es with special consi	deration	
incorporated,	need input,	✓N/A	
2. Contribute to an ope	n space network		
incorporated,	need input,	<b>√</b> N/A	
3. Emphasize connections to parks and greenways			
incorporated,	need input,	<b>√</b> N/A	
4. Incorporate open spa	ace into residential d	levelopment	
incorporated,	need input,	<b>√</b> N/A	
5. Develop green roofs			
incorporated,	need input,	N/A	
6. Provide plazas in high use areas			
incorporated,	need input,	<b>√</b> N/A	

7. Determine plaza function, size, and activity			
incorporated,	need input,	✓ N/A	
8. Respond to microc	limate in plaza desig	ın	
incorporated,	need input,	✓ N/A	
9. Consider views, cir	culation, boundaries	s, and subspaces in plaza design	
incorporated,	need input,	M/A N/A	
10. Provide an approp	oriate amount of plaz	za seating	
incorporated,	need input,	✓ N/A	
11. Provide visual and	l spatial complexity	in public spaces	
incorporated,	need input,	N/A	
12. Use plants to enliv	ven urban spaces		
incorporated,	need input,	N/A	
13. Provide interactive	e civic art and fount	ains in plazas	
incorporated,	need input,	<b>√</b> N/A	
14. Provide food service for plaza participants			
incorporated,	need input,	✓N/A	
15. Increase safety in plazas through wayfinding, lighting, & visibility			
incorporated,	need input,	✓N/A	
16. Consider plaza operations and maintenance			
incorporated,	need input,	<b>√</b> N/A	

#### **GUIDELINES FOR BUILDINGS**

1. Build to the street			
incorporated,	need input,	<b>√</b> N/A	
2. Provide multi-tenant	, pedestrian-oriented	development at the street level	
incorporated,	need input,	<b>√</b> N/A	
3. Accentuate primary	entrances		
incorporated,	need input,	<b>√</b> N/A	
4. Encourage the inclus	sion of local characte	er	
incorporated,	need input,	<b>√</b> N/A	
5. Control on-site parking			
incorporated,	need input,	N/A	
6. Create quality construction			
incorporated,	need input,	N/A	
7. Create buildings with human scale			
incorporated,	need input,	N/A	

### Montopolis Water Reclamation Initiative (WRI) Storage Reservoir and Pump Station Project

### **Project Description**

This project is for the construction of a new reclaimed water ground storage reservoir, pump station, and associated piping located at 2711 Montopolis Drive, Austin, TX 78741.

The Montopolis WRI reservoir will be a 4 MG ground storage tank approximately 130 feet in diameter and 45 feet in height used to store treated and filtered wastewater effluent prior to transport for beneficial reuse application. The tank is important in the function of the reclaimed water system south of the Colorado River. It will back-feed into the Central Low Service Area and provide reliability to that part of the reclaimed water system. It will also pump into the Central Service Area, provide water to customers in that area, and improve reliability to that area. Potential new customers include the AE Control Center, Tokyo Electron, an AE Business Park and two planned apartment complexes. A new pump station, adjacent to the tank and located on high ground of the site will convey water from the tank to the distribution system. This pump station is to be designed to provide 8.6 MGD ultimate firm capacity (based on four pumps at 2000 gpm each with one unit out of service).













![](_page_17_Figure_0.jpeg)

# MONTOPOLIS RESERVOIR AND PUMP STATION – DESIGN COMMISSION

### February 22, 2016 Presented by

Shwetha Pandurangi, PE,CFM Project Manager, Reclaimed Water Program

Joe Jenkins, PE

CH2M

www.austintexas.gov/water

Austin

### Topics

![](_page_19_Picture_1.jpeg)

- Background
- What is "Reclaimed Water"
- City of Austin's Reclaimed Water Program
- Montopolis Reservoir and Pump Station
- Q & A

![](_page_20_Picture_0.jpeg)

### **Background-Austin**

![](_page_20_Picture_2.jpeg)

### **Reclaimed Water**

![](_page_21_Picture_1.jpeg)

![](_page_21_Picture_2.jpeg)

### **Reclaimed Water**

![](_page_22_Picture_1.jpeg)

- Highly purified wastewater effluent
- Quality akin to river water
- Major uses:
  - Irrigation
  - Cooling
  - Manufacturing
  - Toilet flushing
  - Laundry
  - Construction Activities

![](_page_22_Picture_11.jpeg)

![](_page_22_Picture_12.jpeg)

### **Reclaimed Water**

![](_page_23_Picture_1.jpeg)

- Low Priced Non-Drinking Water
- Conserves Drinking water
- More Natural Stream Flow
- Conserves Energy
- Reduces CO<sub>2</sub> Emissions
- Considers Future Generations
- Defers Water Treatment Plants
- Defers Water Contract Payments
- No Watering Restrictions
- Inexpensive to Treat and Use

![](_page_23_Picture_12.jpeg)

### **Austin's Reclaimed Water**

Water Reclamation Initiative(WRI)

Miles of trans. main ~ 51

Storage Capacity ~ 4.2 MG Annual use ~ 1.2 BG

![](_page_24_Figure_4.jpeg)

www.austintexas.gov/water

Austin

ATE?

- ~ 4.0 MG Reservoir
- Pumps water from the red to the blue zone
- Rainwater Harvesting
- Water used on site for toilet flushing, rechlorination and fire fighting
- Water used off site for irrigation, cooling, manufacturing and toilet flushing
- ART in Public Places Participation

Austin

Clearly Re

![](_page_26_Picture_1.jpeg)

- Architect Renderings
- Landscape Plan
- Sidewalk for Pedestrians
- Enhancing Streetscape
- Minimizing curb cuts
- Previously Zoned Industrial

![](_page_26_Picture_8.jpeg)

Austin

Clearly Relid

![](_page_26_Picture_9.jpeg)

- Street level windows
- Rain gardens
- Screening mechanical and utility equipment

Clearly Relic

- Planting trees/tree bank
- Visual complexity in buildings
- Using plants to enliven urban spaces

![](_page_27_Picture_7.jpeg)

- Lighting and visibility
- Primary entrance accentuated
- Controlled onsite parking
- Picnic table
- Quality construction
- Sustainability considerations

![](_page_28_Picture_7.jpeg)

Austin

Clearly Reliable

![](_page_28_Picture_8.jpeg)

![](_page_29_Picture_1.jpeg)

![](_page_29_Picture_2.jpeg)

![](_page_30_Picture_0.jpeg)

![](_page_31_Picture_1.jpeg)

![](_page_31_Figure_2.jpeg)

![](_page_32_Figure_0.jpeg)

![](_page_33_Picture_1.jpeg)

![](_page_33_Figure_2.jpeg)

![](_page_33_Picture_3.jpeg)

![](_page_34_Picture_1.jpeg)

![](_page_34_Picture_2.jpeg)

### **SOUTH ELEVATION**

![](_page_34_Picture_4.jpeg)

### EAST ELEVATION

![](_page_35_Picture_1.jpeg)

![](_page_35_Picture_2.jpeg)

### **NORTH ELEVATION**

![](_page_35_Picture_4.jpeg)

**WEST ELEVATION** 

![](_page_36_Picture_1.jpeg)

![](_page_36_Picture_2.jpeg)

![](_page_36_Picture_3.jpeg)

![](_page_36_Picture_4.jpeg)

![](_page_36_Picture_5.jpeg)

### **Sustainability Considerations**

![](_page_37_Picture_1.jpeg)

- Stormwater Design–Quality and Quantity Design
- Water Use Reduction—Reclaimed Water Used in Toilet and Outside Watering
- Construction Waste Management
- Water Efficient Landscaping
- Natural Lighting in Work Spaces
- Energy Efficient LED Lighting
- IECC Roof Solar Reflectance Index (SRI) Value
- Pump and Electrical Equipment Designed for Efficiency – Optimized Energy Usage

![](_page_37_Picture_10.jpeg)

![](_page_38_Picture_0.jpeg)

# We would appreciate your support of this project.

### **Questions?**

### Item 4A

### 2016 City of Austin Design Commission Architecture and Development Working Group

Infrastructure Design Guidelines: Defining Infrastructure and Infrastructure Projects Commissioner Whatley Commissioner Carroll Commissioner Gonzalez

#### INFRASTRUCTURE DEFINITION

Infrastructure is interconnected components that form a framework for urban development. These components include roads, sidewalks, water & electrical distribution, public signage, drainage systems, and parks. Infrastructure can play both a performative and design function. Infrastructure can enhance the quality of life for citizens and good design can create both iconic structures and infrastructure components that perform efficiently and complement the goals of the Imagine Austin comprehensive plan.

<u>Green Infrastructure</u>: Parks, the urban forest, urban trails, greenways, rivers, creeks, lakes, gardens, urban agriculture, open spaces, and wildlife habitat and the relationships between them and the rest of the city (*Imagine Austin*).

#### WHAT INFRASTRUCTURE PROJECTS WE WANT TO SEE

(List of items to see is stuff that matters and we can later restrict if need be)

- 1. Elements that impact a person in the public realm. (Vision, noise, walk surface texture)
- 2. Elements close to the public right of way or in the ROW.
- 3. Prioritize
  - a. Vehicular bridges, ped bridges over a certain length.
  - b. Streetscape projects that incorporate new multimodal transit, complete streets
  - c. Water towers (potential to be iconic)
  - d. AE substations within a certain distance of the ROW
  - e. New urban trails
  - f. City way-finding masterplans
  - g. Rail lines
  - h. Pedestrian bridges & skywalks
  - i. Park designs & realignments of paths within
- j. Green infrastructure (as defined above)
- 4. No to review pump houses, below grade, water treatment, airport runways

5. People live in suburban neighborhoods and impoverished areas and infrastructure there matters to them as much as to residents in denser or more affluent areas.

6. 100% SD or DD Phase is a key time to review. Review in CDs is not productive, as small items or colors that can be changed don't have a significant effect.

7. High performance infrastructure across public/private interest

a. coordination between utility companies, city, and private entities working together to provide the best solution for right of way and public improvements.

#### High Performance Infrastructure

Roadway improvements, tree planting, storm water management, and utility trenching are often conceived, budgeted, and executed in isolation from each other, with separate agency priorities and often contradictory mandates. Utility companies, private development, and public agencies that narrowly perceive their own mission make it difficult for cities to obtain the long- term synergies and economies of integrated right-of-way design. Worse still, this leads to frequent doing, undoing and redoing of right-of-way work

We increasingly need to draw upon the collective intelligence of agency leadership, the real estate development sector, and the local professional community to employ innovative solutions holistically across all public and private construction programs. Improve existing asset management processes to provide for more systematic, cost-effective, and environmentally sound management of right-of-way infrastructure components. Enhanced and coordinated asset management will result in extended infrastructure lifecycles, improved performance, more consistent levels of service, and better investment returns.

Some negative aspects are:

- May increase project design, construction and maintenance cost
- Acquisition of additional sidewalk space may be cost prohibitive or unfeasible
- May require the relocation of catch basins
- Maintenance of non-standard street materials is difficult due to frequent utility repairs
- Isolated traffic calming treatments may only divert traffic problems

Use of 'lifecycle analysis' to account for the full range of costs – including environmental and social impacts – over the entire life of an infrastructure asset. The goal of lifecycle analysis is to determine the most cost- effective technical strategies and investment decisions. For example, using urban vegetation and other strategies to decrease urban heat and air pollution. Streetscape improvements have the potential to reinvigorate neighborhoods and increase property values

- Calm traffic and improve safety through narrowing the roadway, adding traffic signals, clarifying crosswalks and providing safe bus loading zones for children
- Provide as much planting as possible within the widened sidewalk
- Integrate and expand a popular neighborhood park
- Provide pedestrian amenities including seating, bike racks, additional street lighting and bollards at parking garage exits
- Upgrade subsurface utilities to limit future reconstruction
- Support local retail by encouraging more pedestrian movement
- Transform barren concrete street islands, medians, and other impervious sections of the rightof-way into gardens
- Promote urban beautification and revitalization cost-effectively
- Improve the site's legibility, accessibility, and connectivity
- Increasing public space for pedestrians and bikers
- Use Vegetated filters and Buffer strips
- Use infiltration structures
- Encourage ecological connectivity and absorbent landscapes
- Perform soil beaming
- Increase quantity, density, and diversity of trees
- Protect water sources. Use low maintenance, salt tolerant, native or naturalized species