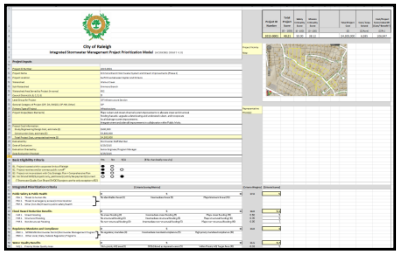
# Update on Integrated Stormwater Project Prioritization Model Development

Stormwater Management Advisory Commission

July 9, 2015






tomato
spinach
cucumber
lettuce
turnip
broccoli
red cabbage
squash
potato
mint
asparagus
Brussels sprouts
carrot
peas
radish
garlic
okra
cauliflower
onion
eggplant
mushroom
string beans

**Pairwise Rating Example - Comparing Vegetables**

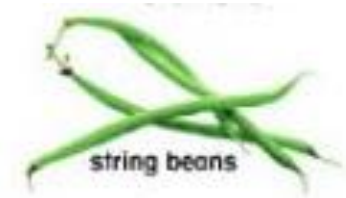
| | Green Beans | Broccoli | Brussel Sprouts | Carrots | Asparagus | Spinach | Corn | Sum | Weight % |
|---|---|---|---|---|---|---|---|---|---|
| Green Beans | | 2 | 3 | 2 | 3 | 2 | 4 | 16 | **12.7** |
| Broccoli | 4 | | 3 | 4 | 3 | 2 | 5 | 21 | **16.7** |
| Brussel Sprouts | 3 | 3 | | 4 | 3 | 2 | 1 | 16 | **12.7** |
| Carrots | 4 | 2 | 2 | | 2 | 2 | 3 | 15 | **11.9** |
| Asparagus | 3 | 3 | 3 | 4 | | 3 | 2 | 18 | **14.3** |
| Spinach | 4 | 4 | 4 | 4 | 3 | | 5 | 24 | **19.0** |
| Corn | 2 | 1 | 5 | 3 | 4 | 1 | | 16 | **12.7** |
| | | | | | | | | 126 | 100.0 |

| Scoring | |
|---|---|
| 5 | Much more important |
| 4 | Somewhat more important |
| 3 | Equally important |
| 2 | Somewhat less important |
| 1 | Much less important |


19.0%


16.7%


14.3%



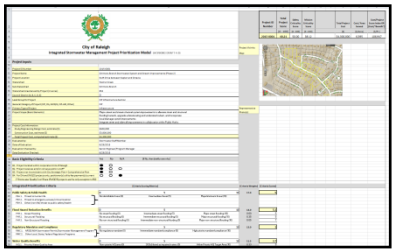


12.7%


11.9%

# Outline

- Reminder of Program Commitment to Council and Key Outcomes
- Highlights of collaborative Model Development Work of SMAC Sub-Committee + Staff Team
- The preliminary working Model with real world examples
- SMAC Feedback & Discussion



# Commitment to City Council

Key Policy Themes

- Should the City's Stormwater Program become more proactive? If so, in what ways?
- To what extent should stormwater systems be treated as public systems?
- How much public benefit is sufficient to merit City participation in a stormwater improvement project?
- To what extent should the City invest in stormwater services?

Action Plan

- **Work with SMAC to develop specific program enhancement recommendations** for Council consideration within 12 – 18 months
- **Develop Integrated Project Prioritization Model ahead of FY 17 budget as first phase**
- Provide budgetary and resource information in concert with above

# Key Outcomes

- The **Integrated Stormwater Project Prioritization Model**
- **Scoring Guidance/Metrics** for **Weighted Criteria** within model
- **Process for implementing, applying, and adaptively updating** the model

# Highlights of SMAC Sub-Committee + Staff Collaboration

- **Many thanks** to the SMAC Sub-Committee and Staff Team
  - **Three, two-hour work sessions**
    - May 26, June 3, and June 18
- Time outside of scheduled work sessions in preparing for meetings and **completing exercises to help evaluate and rank prioritization model criteria**
- Welcomed and provided **time for public input during meetings**
- **Request for written public input** was also extended

# Highlights of SMAC Sub-Committee + Staff Collaboration

- **Foundational elements** of prioritization model
  - Basic eligibility criteria
    - Yes or No
  - **Integrated prioritization criteria**
    - Weighted
    - Scored
  - Total project score
  - Safety criticality score
  - Mission criticality score
  - Project cost information
    - Cost/area and other cost/unit information

- *Public Safety & Public Health*
- *Flood Hazard Reduction Benefits*
- *Regulatory Mandates & Compliance*
- *Water Quality Benefits*
- *Watershed Management Benefits*
- *Stormwater Infrastructure Asset Management Benefits*
- *Community Support & Implementation Complexity*
- *Resource Leveraging Opportunities*
- *Indirect Community Benefits*

# Highlights of SMAC Sub-Committee + Staff Collaboration

- **Evaluation and ranking of integrated prioritization model criteria**

| Summary Results for SMAC Sub-Commmitte + Staff Team (9x9 option) | | | | | | | |
|---|---|---|---|---|---|---|---|
| | Avg Wt % | Avg Rank | Cumul. % | Wt % High | Wt % Low | Rank High | Rank Low |
| Public Safety & Public Health | 17.037 | 1 | 17.037 | 18.1 | 16.2 | 1 | 1 |
| Flood Hazard Reduction Benefits | 13.611 | 2 | 30.648 | 16.7 | 8.8 | 1 | 8 |
| Regulatory Mandates & Compliance | 12.870 | 3 | 43.519 | 16.2 | 10.2 | 2 | 5 |
| Water Quality Benefits | 11.296 | 4 | 54.815 | 13.9 | 9.3 | 3 | 7 |
| Watershed Management Benefits | 10.185 | 5 | 65.000 | 11.6 | 9.3 | 4 | 6 |
| Stormwater Infrastructure Asset Management Benefits | 9.954 | 6 | 74.954 | 11.1 | 7.4 | 4 | 8 |
| Community Support & Implementation Complexity | 9.306 | 7 | 84.259 | 12.5 | 6.9 | 4 | 8 |
| Resource Leveraging Opportunities | 8.565 | 8 | 92.824 | 11.1 | 6.9 | 3 | 8 |
| Indirect Community Benefits | 7.176 | 9 | 100.000 | 11.1 | 5.1 | 4 | 9 |
| | 100.000 | | | | | | |





# The Preliminary Working Model

| Project | Type | Total Project Score | Safety Criticality Score | Mission Criticality Score | Total Project Cost ($ est.) | Cost/Area ($/AC) | Cost/"Benefit" ($/PT) |
|---|---|---|---|---|---|---|---|
| Pigeon House Restoration | CIP - Multi | 79.84 | 70 | 78.81 | $12,000,000 | 4,488 | 150,301 |
| Lower Longview Lake Dam | CIP - Multi | 70.31 | 100 | 84.52 | $3,350,000 | 4,786 | 47,646 |
| Northshore Lake Restoration | CIP - Multi | 64.94 | 90 | 78.72 | $4,575,000 | 12,500 | 70,450 |
| Citywide LID-GI Study | Planning/Study | 49.85 | 0 | 42.16 | $568,000 | 6 | 11,394 |
| Yorkshire Downs | CIP Infra | 42.83 | 50 | 41.46 | $3,700,000 | 24,667 | 86,378 |
| E Martin/Camden Rehab | CIP Infra | 42.00 | 70 | 36.44 | $200,000 | 6,667 | 4,762 |
| Simmons Branch Ph 2 | CIP Infra | 40.46 | 50 | 38.12 | $4,300,000 | 6,595 | 106,287 |
| East and Boundary Drainage | CIP Infra | 37.69 | 70 | 31.38 | $125,000 | 4,310 | 3,316 |
| Temple Dr Drainage | DA | 30.29 | 50 | 27.92 | $177,000 | 4,425 | 5,843 |
| 4125 Windsor Place | DA | 29.30 | 70 | 28.56 | $66,300 | | 2,263 |
| Typical DA Stream Proj | DA | 17.83 | 10 | 14.38 | | | |
| Lower Longview Lake Dredging | CIP - WQ | 8.64 | 0 | 7.72 | $1,700,000 | 2,429 | 196,835 |

# Schedule/Milestones

| | | |
|---|---|---|
| ✓ City Council | **Jan – Mar 2015** | **Stormwater Program/Budget Workshops with City Council** |
| ✓ Staff Team | Mar – April | Staff Initial Planning Work/Internal Kickoff |
| ✓ SMAC | **May 7** | **SMAC - Kickoff** |
| ✓ SMAC + Staff | May 26, 3 – 5 PM | SMAC Sub-Committee Workshop #1 |
| ✓ SMAC + Staff | June 3, 3 – 5 PM | SMAC Sub-Committee Workshop #2 |
| ✓ SMAC + Staff | June 18, 3 – 5 PM | SMAC Sub-Committee Workshop #3 |
| SMAC | **July 9** | **SMAC – Update & Review Preliminary Model** |
| SMAC + Staff | July - Aug | (Potential Sub-Committee Workshop #4, #5 if/as needed) |
| SMAC | **Sept 3** | **Final Initial Model/Approach to SMAC** |
| City Council | **Oct - Nov** | **To Council for information** |
| Staff Apply Model with SMAC | **Oct – Dec 2015** | **Ready for initial use for FY 2017 Budget Season** |

# SMAC Feedback & Discussion