City of Cambridge

Richard C. Rossi • City Manager



Executive Department

Lisa C. Peterson • Deputy City Manager

Summer 2014

Dear Colleagues and Community Members:

During the past several years, the City has engaged in an intensive EGov process in order to improve the way we use information technology (IT) in service of the public.

This process developed a new decision-making framework for guiding information technology investments. This framework will ensure that the City's overall portfolio of IT assets, projects and programs allows City departments to best serve the Cambridge community. I would like to thank everyone for the time and effort they invested into helping us develop a system that will result in a more transparent, efficient and effective use of public resources in future IT investments.

The attached user guide explains the new decision making process, called a governance framework, including the steps involved in our new project request and review process.

I encourage you to email the Project Review Committee at egov@cambridgema.gov if you have questions, if you are interested in becoming involved in new IT initiatives, or if you have ideas on how Cambridge can better use technology to benefit our community.

Sincerely,

Richard C Rossi, City Manager

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A New IT Governance Model

"Governance" is how an organization makes decisions. It provides the accountability framework to ensure decisions are made by the right parties, with the benefit of the right input, and are communicated to all appropriate stakeholders.

From July-Oct 2013, senior managers from numerous City departments participated with the Gartner Consulting Group to develop a formal IT governance process. In addition to this EGov Executive Committee, other City staff who work directly with information technology gave input into the process through numerous meetings of the EGov Project Management Committee.

Best practices show that effective governance begins with the development of a clear purpose, membership, roles and responsibilities, and processes.

The goal of the City's new governance model is to ensure that IT spending decisions reflect the goals of the City Council and help achieve clearly articulated principles and criteria that meet the needs of the City as an organization. The governance process will evolve over time, as needed, so as to provide the best framework for on-going governance activities. The City will assess the effectiveness of the governance model on an annual basis, and will issue updates as needed to ensure continual alignment with City Council goals and objectives, City administration IT principles and project evaluation criteria, community needs, and the ever evolving technology landscape.

A New Approach to Allocating Investments: Run, Grow and Transform

The City has committed to sufficiently funding maintenance and operations activities needed to "keep the lights on," while at the same time investing in growth and transformative projects that embrace innovation to enhance service delivery to the community. To achieve this, the City will determine a target allocation across the three IT core missions:

Run

• Run the organization: IT resources consumed and focused on the continuing operation of City business, such as telecommunications, servers and storage.

Grow

• **Grow/Enhance the organization:** IT resources consumed and focused on developing and enhancing IT systems in support of City business growth or improvement, such as automating manual processes or leveraging existing software for new uses.

Transform

• **Transform the organization:** IT resources consumed and focused on implementing technology systems that enable the City to enact new business models, such as citizen self-service applications, collaboration and social media.

On an annual basis, the City will assign a target range for each of the three core missions and will aim to fund projects that align with this target allocation. Department project requests will be considered in the context of other requests in the same allocation category.

Factors That Will Guide IT Investment Decisions

City Council Goals and Objectives

- •Foster community and support neighborhood vitality. Support opportunities for citizens to participate and to know each other within their neighborhoods and across the city
- Evaluate City expenditures with a view of maintaining a strong fiscal position and awareness of the Impact on Taxpayers while providing a high quality array of city services.
- •Strengthen and support human services, public education and out of school learning in Cambridge for the benefit of residents of all ages.
- Value and support the racial, socio-economic, cultural and religious diversity of our city.
- Promote public safety and address the challenges and opportunities for multiple modes of transportation to safely share roads and sidewalks.
- Promote a healthy community and environment to advance Cambridge as a leader in public health and environmental sustainability.
- Preserve and create affordable housing across the City for low, moderate and middle-income families and other residents.
- Promote doing business in Cambridge and work to strengthen our mutually beneficial partnerships with businesses and universities.

IT Principles

- •The City Governance body will be informed of all key technology investments and will communicate decisions about funding for technology investments in an open, clear format.
- •IT investments that exhibit citywide contribution and applicability will be given strong consideration of funding prioritization
- •The City will allocate an annually determined % range of the IT budget for each of IT's core missions: Run, Grow/Enhance, and Transform.
- •The City will provide high-value applications and services that are secure and do not negatively impact overall IT infrastructure and, where possible, support environmental sustainability.
- •The City will aim to buy an IT solution or service from financially stable, experienced vendors, where possible.
- •The City prefers technologies and services that are mature, stable, secure and proven in the field. Less mature, stable, secure and proven technologies will be considered when deemed low risk.
- •City will receive regular progress reports for Run, Grow, Enhance and Transform investments to ensure investments deliver value to the City. Key metrics will be reviewed when available.

Project Evaluation Criteria

- Public investment: Impact on service delivery, public safety, quality of life, and/or public health and environmental sustainability.
- Cost: Total cost of ownership including internal and external resource requirements for implementation, maintenance, upgrades and training.
- •Benefits: The quantitative ("hard") and qualitative ("soft") benefits a project is expected to deliver. Consider value across the City.
- Resource and business process impact: The impact on internal /external resources and on the City's ability to redesign business processes or undertake similar process-intensive initiatives.
- •Architecture and infrastructure fit: The integration, scalability and resilience of the applications, databases, operating systems, and networks that the City has implemented and/or plans to implement. Includes impact on City infrastructure.
- Risk: Identify the exposure of the proposed initiative to failure or underachievement. Must include information security risk.

EGov Committees: Responsibilities and Membership

EGov Executive Committee

- Serves as the primary decision-making body for IT investments in the City of Cambridge
- Using <u>Evaluation Criteria</u>, prioritize approved projects and determine if and when projects and change requests will be funded
- Maintain distribution of "Run/Grow/Transform" projects in alignment with agreed-upon allocation ranges
- Review lessons learned for "Grow" and "Transform" projects to inform future IT investments
- Align technology initiatives and investments with the City strategy and the portfolio
- Ensure a steady flow of communications. Communicate strategy and committee investment decisions to stakeholders to create understanding at all levels of the enterprise about which investments have been approved
- Ensure the progress of technology projects, services and investments at the strategic level is successful. Resolve issues that impede the effective delivery of investments.
- Explore opportunities to tap into the Cambridge educational and technology ecosystem, as well as leverage Commonwealth or other municipal IT services to foster innovation and maximize use of available resources.

Current Executive Committee Membership

Member	Title	Department
Richard Rossi	City Manager	
Lisa Peterson	Deputy City Manager (chair)	
Louis DePasquale	Assistant City Manager	Fiscal Affairs
Brian Murphy	Assistant City Manager	Community Development
Ellen Semonoff	Assistant City Manager	Human Services
Susan Flannery	Director	Library
Martha Flynn	Co-Chair Project Management Committee	Assistant Commissioner ISD
Jeana Franconi	Budget Director	Budget
Rebecca Fuentes	Co-Chair Project Management Committee	Assistant Commissioner DPW
Robert Haas	Commissioner	Police Department
Mary Hart	Chief Information Officer	IT Department
Mike Dugas	Deputy Director	IT Department
Claire Spinner	Chief Financial Officer	School Department
Steve Smith	Chief Information Officer	School Department
Lee Gianetti	Director of Communications	Executive Department

EGov Project Review Committee

- Ensure new IT projects and project change requests align with IT Principles
- Analyze proposed projects to assess cross-departmental impacts, resource needs, and impact to current capacity
- For IT projects that cost less than \$50,000 or require less than 100 City staff hours, or which do not involve key technologies: approve or deny new IT project requests and major change requests
- For projects in excess of \$50,000 or 100 City staff hours, or which involve key technologies: recommend approval or denial of new IT project requests and major change requests

• Ensure a steady flow of communications. Communicate strategy and committee investment decisions to stakeholders to create understanding at all levels of the enterprise about which investments have been approved

Current Project Review Committee Membership

Member	Title	Department
Lisa Peterson	Deputy City Manager (chair)	
Louis DePasquale	Assistant City Manager	Fiscal Affairs
Mary Hart	Chief Information Officer	IT Department
Mike Dugas	Assistant Director	IT Department
Martha Flynn	Co-Chair Project Management Committee	Assistant Commissioner ISD
Rebecca Fuentes	Co-Chair Project Management Committee	Assistant Commissioner DPW
Lee Gianetti	Director of Communications	Executive Department

EGov Project Management Committee (PMC)

- Conduct analyses of proposed projects to assess cross-departmental impacts, resource needs, and impact to current IT capacity
- Provide support, technical assistance, and advice to Departments with technology needs to assist throughout the project scoping and execution process
- Monitor ongoing projects on a quarterly basis, recommending project changes to the E-Gov Executive Committee as appropriate, and summarizing status of "Grow" and "Transform" projects to the E-Gov Executive Committee
- Manage special projects on an as needed basis.

Current Project Management Sub-Committee Chairs

Member	Department	Sub-Committee
Martha Flynn (PMC co-chair)	Inspectional Services Department	Software Group
Rebecca Fuentes (PMC co-chair)	Public Works Department	Productivity Group
Mike Dugas	IT Department	Infrastructure Group
Lee Gianetti	Executive Department	Citizen Group
Manisha Tibrewal	Budget Office	Equipment Group

Current Sub-committee Members

Member	Member	Member
Jeana Franconi	Cliff Cook	Justin Handfield
Jeff Amero	Jeremy Warnick	Karen Brown
Janice Alger	Christina Giacobbe	Sheila Keady-Rawson
Michele Kincaid	Donna Lopez	Jim Monagle
Linda Turner	Amy Witts	Fred Centanni
Eta Tsegaye	Karen Preval	Kimberly Sansoucy
Stephen Maywalt	David Mahoney	Ken Pitts
Stanley Chu	Awens Dalembert	Glenn Turner
Mike DeSantis	Mary Greene	Kelly Linehan
Ellen Watson		

Public Representation in the Process

Over the past couple years, a group of Cambridge residents who work in the technology industry have given input into the initial phases of improving how the City uses technology in the service of public needs. We are extremely grateful for their service.

Community representatives during the first phase of the EGov process:

Member	Background
Art Bardige	Founder and President, Enablelearning.com and & 501c(3) Sustainablelearning.com
Brian Burke	Senior Director, State Government Affairs, Microsoft
Jerry Grochow	Vice President, the University Corporation for Advanced Internet Development (Internet2)
Tarun Rathham	Google Cambridge Team, Sales in the Software and Services Industry
Oliver Thomas	Information Services and Technology, MIT. Special Liaison to Faculty and Student Experience

The City Manager will be recruiting community members to become involved in the next phase of this process, which is to serve on a board to provide ongoing review and input into the City's IT strategic plan/portfolio of investments.

Departmental Impact of This New Governance Process

Applying new governance model to purchases

Requesting departments must complete the online IT project request form to formally request review and approval of any information technology project. For the purpose of this governance process, a project is defined as a discrete, finite set of tasks and activities that uses information technology to run, enhance or transform City business processes or to benefit the public. A project may be department-specific or cross-departmental. A project requires resources, funding and has a specific timeline. Ideal projects will advance IT Principles and align with the evaluation criteria.

Developing a request

Departments must be able to articulate the need for and benefits of a proposed project, and ensure alignment with City goals, objectives, principles and evaluation criteria. In addition to fulfillment of the department's specific mission, the requesting department should aim to investigate broader citywide benefits that could be realized, potential public impact, and impact on current capacity. The department should be prepared to sponsor, fund, and/or lead the project, and to collaborate with other departments.

Larger, longer-term projects will be required to submit quarterly reports in order to ensure that schedules and budgets remain on track, and to help others learn from your experiences.

Transactional purchases (e.g. a new printer, laptop or other small asset) do not require governance approval, but must align with the City's IT Principles and technology standards; however, departments do need to complete a request form for all such purchases. The form for these types of purchases is much shorter and has a list of pre-approved options to choose from. Generally speaking, these requests can be quickly approved by the IT Department.

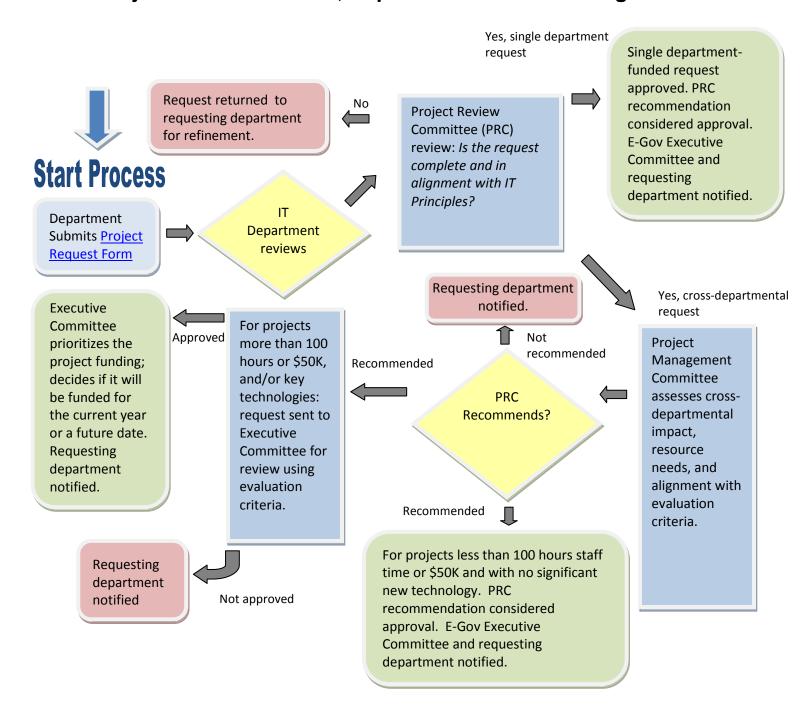
Project Review Process

The process is described in detail below using two different methods— a narrative description and a process diagram.

Narrative Description of the Project Review Process

- 1. Requesting department completes Project Request Form.
- 2. IT Department reviews request.
 - All proposals are forwarded to the **Project Review Committee**.
- 3. <u>Project Review Committee</u> reviews request for completeness and alignment with <u>IT Principles</u>.
 - If the request is incomplete, requires additional information, or is not aligned with IT Principles, the request is returned to the requesting department for refinement.
 - If the project is for a single department, has dept funding or was funded in budget, PRC recommendation considered approval.
 E-Gov Executive Committee and requesting department notified.
 - If the project request is cross-departmental, it is referred to the <u>Project Management Committee</u> to assess crossdepartmental impact, resource needs, and alignment with evaluation criteria.
- 4. Project Review Committee decides whether to recommend approval:
 - If the <u>Project Review Committee</u> recommends approval, it advances to the next step for consideration.
 - For projects requiring less than 100 hours staff time or less than \$50,000 and with no significant new technology: request is approved, <u>E-Gov Executive Committee</u> and requesting department are notified.
 - For projects more than 100 hours staff time or more than \$50,000, and/or key technologies: request is routed to E-Gov Executive Committee for review using evaluation criteria.
- 5. Executive Committee reviews project.
 - If approved, Executive Committee prioritizes the new project amongst other approved projects and decides if the project will be funded for the current year or a future date.
 - Requesting department notified of decision.

Same Project Review Process, Depicted as a Process Diagram



Timeframe for Review of Requests

The goal of this process is to be able to balance thoughtful consideration of IT investments with providing departments with the tools they need to complete work efficiently and effectively. Departments may submit a request at any time, and initial review by the IT Department will be done on a continuous basis. In order to review project proposals and communicate back to departments, the Project Review Committee, the Project Management Committee, and the Executive Committee meet on a regular basis, as needed.

Committees thank you for your patience as we all learn and make adjustments along the way.

Emergency exceptions

In the event of an emergency—whether due to the failure of critical infrastructure or an urgent situation that requires responders to have new tools—the IT Department and the Project Review Committee will accept brief project descriptions for an expedited review and approval. In the case of true emergencies, this can usually be accomplished by a phone call to the City Manager's Office, who will coordinate communication with all stakeholders.

However, once the emergency situation has passed, documentation of the investment will still be needed, and the investment will become part of the City's overall portfolio.

Annual Process Evaluation

A summary of the City's entire IT portfolio of approved projects—which will come to represent our Strategic Investment Plan—will be posted online and available for anyone to review at any time.

On an annual basis, the City will assess the effectiveness of the governance model and update this process as required to improve performance for the next year. The City will aim to answer key questions such as:

- Is the Committee effectively achieving its purpose and expected outcomes?
- Are the right stakeholders involved in the process?
- Is the exceptions process effectively capturing new opportunities for the City?

The City Manager's office, in coordination with the Executive Committee, may decide at any point to review and modify the process if concerns arise about its effectiveness. Minor procedural modifications or membership changes to any of the EGov committees may also be made at any point with the approval of the Executive Committee.