pennsylvania
OFFICE OF ADMINISTRATION
INFORMATION TECHNOLOGY

Information Technology Policy

Internet Accessible Proxy Servers and Services

ITP Number	***Effective Date***
ITP-SEC002	November 8, 2005
Category	***Supersedes***
Recommended Policy	
Contact	***Scheduled Review***
RA-ITCentral@pa.gov	December 2014

This Information Technology Policy (ITP) provides direction regarding the use of proxy servers and services by commonwealth agencies.

1. Purpose

The purpose of the Information Technology Policy (ITP) is to provide direction regarding the use of proxy servers and services by commonwealth agencies within an Office of Administration (OA) / Office for Information Technology (OIT) / Enterprise Server Farm (ESF). This ITP establishes the policy for utilization of OA/OIT/ESF Managed Services, and the approval process to continue to use existing or obtain new servers/services.

The Commonwealth of Pennsylvania has been rapidly deploying mission critical web accessible applications to meet the business needs of the commonwealth agencies and the constituents of Pennsylvania. Security vulnerabilities and cyber terrorism have become common, so it is imperative that the commonwealth take the necessary steps to ensure the integrity and availability of mission critical applications which rely on proxy servers by mitigating these vulnerabilities.

The OA/OIT/Bureau of Infrastructure and Operations (BIO) provides a highly-secure and redundant facility, the Enterprise Server Farm (ESF), for enterprise Internet and Intranet services. Extensive steps have been taken to ensure the proper physical and network security is in place to provide a dependable level of service for mission critical applications. Using this facility, the Office of Administration/Enterprise Server Farm/Managed Services offers centralized proxy servers and services for commonwealth agencies.

2. Scope

This Information Technology Policy (ITP) applies to all departments, boards, commissions and councils under the Governor's jurisdiction. Agencies not under the Governor's jurisdiction are strongly encouraged to follow this ITP.

3. Policy

To ensure maximum security within the Commonwealth of Pennsylvania, commonwealth agencies are required to utilize the OA/OIT/ESF/Managed Services to fulfill their business

requirements for proxy servers and services. This policy applies to new or existing proxy servers that are to be located in an OA/OIT ESF, and are required to proxy communications from the Internet to the Metropolitan Area Network (MAN). Proxy services are to be utilized on a limited basis, and the implementation of new proxy servers at any OA/OIT ESF location will require an exemption from this policy.

Proxy servers, and all corresponding web servers, whether at an OA/OIT ESF location or at an agency location, will be subject to security Internet scans and vulnerability scans prior to network connectivity, and will be required to have an Intrusion Detection System (IDS) server sensor installed.

The Enterprise Security Team will contact the OA/OIT/ESF or respective agency contact, if a security incident occurs on a proxy server or web server. A timeframe will be established for the resolution of the incident, depending upon the incident severity. If the vulnerability is not addressed within the requested timeframe, the agency will be required to remove all proxy servers, and either utilize OA/OIT ESF Managed Services proxy services or relocate all web servers to an OA/OIT ESF facility.

4. Exemptions

Establishing enterprise-wide security standards for web applications is critical, as Commonwealth agencies develop more and more critical and highly critical internet accessible applications. Therefore, OIT strongly encourages agencies not to seek exemptions from this policy.

In the event an agency chooses to seek an exemption, for reasons such as the need to comply with requirements for a federally mandated system, a request for a waiver is to be completed and submitted via the Commonwealth of Pennsylvania Policy and Procurement Action Request (COPPAR) process. Requests are to be entered into the COPPAR Tool located at http://coppar.oa.pa.gov/. Agency CIO approval is required.

The waiver request is to state why the standard ESF Managed Services offering option cannot be used. Details are required about the application, connectivity, server requirements, and equipment location. Network diagrams are to be included to illustrate the security components that will protect the proxy server(s) and the corresponding web servers that are housed at the agency or in a co-location space.

After the proxy server waiver has been reviewed by Enterprise Security, one of the following responses will be forwarded to the agency:

- **Approved** – Web server may reside at agency location(s) and Agency managed proxy server solution may be implemented in an OA/OIT ESF facility.
- **Approved with conditions** – Web server can reside at agency location(s); however it is to utilize the ESF Managed Services proxy services.
- **Disapproved** - Web server is to reside in an OA/OIT ESF facility.

If an agency is granted an exemption in whole or in part, the agency is to agree to allow the installation of IDS server sensors on the proxy servers and the internal web servers that are serviced by the proxy server. All agency web servers will be required to have a server sensor installed, whether it is directly or indirectly accessible from the internet. The agency is to also

provide access through its firewalls to allow OA Enterprise Security to complete required internet scans and vulnerabilities scans of these servers.

5. Related ITPs/Other References

- None

6. Authority

- Executive Order 2011-05, Enterprise Information Technology Governance

7. Publication Version Control

It is the user's responsibility to ensure they have the latest version of this publication. Questions regarding this publication are to be directed to RA-itcentral@pa.gov.

This chart contains a history of this publication's revisions:

Version	Date	Purpose of Revision
Original	11/8/2005	Base Document
	4/2/2014	ITP Reformat