

# Setting up Firefox (32 or 64 bit computers) or Waterfox (64 bit computers) to use your CAC on a Windows computer

Presented by: Michael J. Danberry

Last Revision / review: 29 December 2016

These tweaks are required to utilize your CAC

If you don't follow these instructions, Firefox(FF) (or Waterfox(WF)) will not know the CAC reader exists enabling you to access CAC secured websites.

This guide requires you to install ActivClient (FF / WF will not work with the built in Windows 7, 8 / 8.1, or 10 smart card software)

ActivClient download locations:

https://militarycac.com/activclient.htm

The most up to date version of this presentation can be found at:

https://militarycac.com/files/FirefoxCACSetup.pdf or

https://militarycac.com/files/Tech Note Firefox CAC Authentication.pdf

### Download Firefox (or Waterfox)



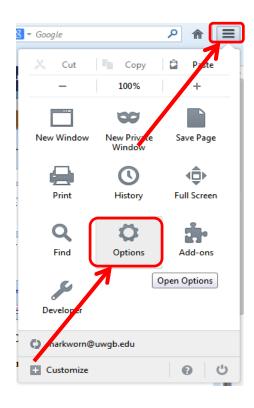
Firefox is used on 32 bit Windows Computers <a href="https://www.mozilla.org/en-US/firefox">https://www.mozilla.org/en-US/firefox</a>



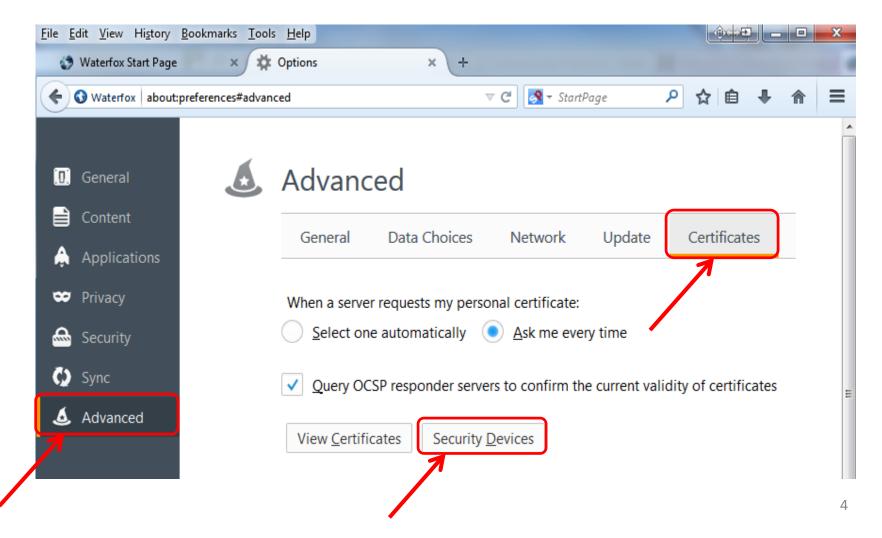
Waterfox is used on 64 bit Windows Computers

https://www.waterfoxproject.org

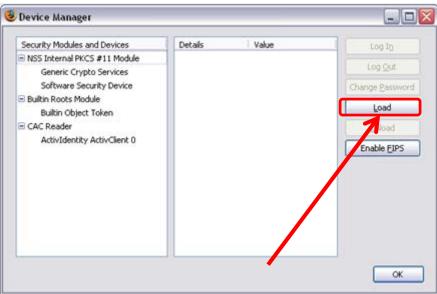
# Open Firefox (or Waterfox) click the 3 parallel lines, then *Options*



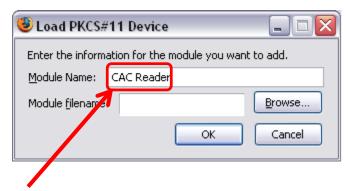
# Select Advanced, Certificates (tab), Security Devices (button)



### Click the *Load* (button)



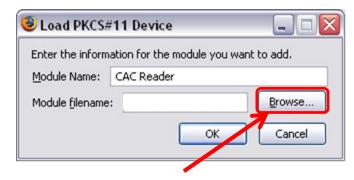
### Type: "CAC Reader" in <u>M</u>odule Name:



## Click <u>Browse...</u> then navigate to locations listed below the image, then click OK



#### **Firefox** specific instructions



- 32 bit Windows Computer with ActivClient **6.2.0.x** (**32** bit) navigate to: **C:\Program Files\ActivIdentity\ActivClient\acpkcs211.dll** You can also try the "acpkcs201-en6.dll" file
- ActivClient 6.2.0.x & 7.0.2.x (64 bit) computers, navigate to C:\Program
   Files(x86)\ActivIdentity\ActivClient\acpkcs211.dll
- ActivClient 7.1.0.x (64 bit) computers, navigate to: C:\Program Files (x86)\HID Global\ActivClient\acpkcs211.dll
- OpenSC (32 bit) computer will find the file located at: C:\windows\system32\opensc-pkcs11.dll
- Coolkey computer will find the "libcoolkeypk11.dll" file located at: C:\Program Files(x86)\Mozilla Firefox\

NOTE (ActivClient users): Some people / computers may receive: "Unable to add module." Some ideas that helped others:

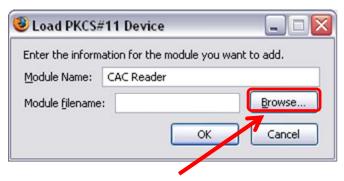
- 1. Navigate to the .dll location, then remove everything BEFORE *acpkcs211.dll* (basically leaving it by itself).
- 2. Run Firefox as an Administrator.

If these tips don't work for you, go back to using Internet Explorer for anything CAC related, you will save yourself a LOT of time and frustration.

## Click <u>Browse...</u> then navigate to locations listed below the image, then click OK



#### **Waterfox** specific instructions



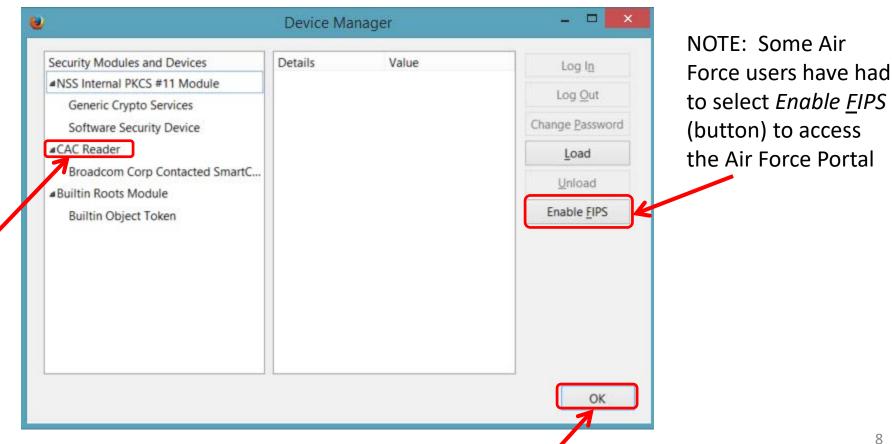
- 64 bit Windows Computer with ActivClient **6.2.0.x** & **7.0.2.x** (**64** bit) navigate to: **C:\Program Files\ActivIdentity\ActivClient\acpkcs211.dll**
- ActivClient 7.1.0.x (64 bit) computers, navigate to: C:\Program Files\HID Global\ActivClient\acpkcs211.dll

NOTE (ActivClient users): Some people / computers will receive "Unable to add module." Some ideas that helped others:

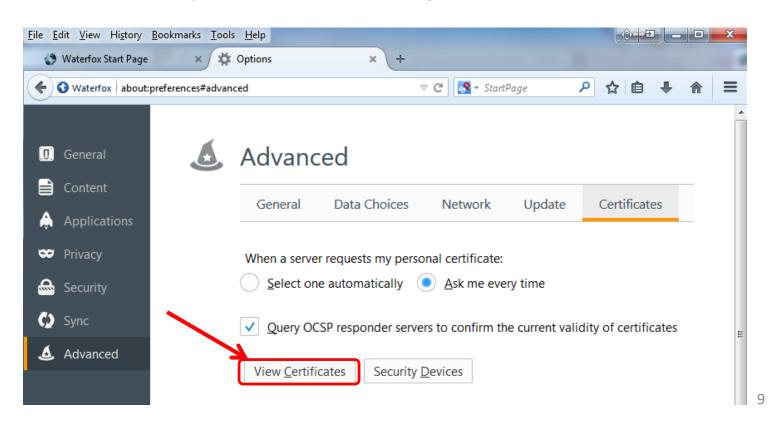
- 1. Navigate to the .dll location, then remove everything BEFORE acpkcs211.dll (basically leaving it by itself).
- 2. Run Waterfox as an Administrator.

If these tips don't work for you, go back to using Internet Explorer for anything CAC related, you will save yourself a LOT of time and frustration.

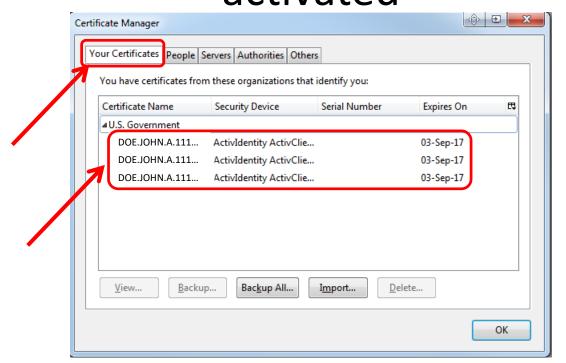
### You should now see CAC Reader in the left column. Select OK to close this window



# Select the *View <u>Certificates</u>* (button) you will be prompted for a "Master Password" (this is the Firefox & Waterfox term for your 6-8 digit **CAC PIN**).



When Certificate Manager opens, you should see three certificates under the *Your Certificates* (tab). Four will show for dual persona personnel who have their PIV activated



# To successfully access DoD websites, you MUST install the Department of Defense (DoD) certificates

Download links for the InstallRoot file(s) can be found on:

https://militarycac.com/dodcerts.htm

It will not harm your computer to run this file more than once

If after installation of DoD certs you see "There is a problem with this website's security certificate" or see red certificate errors, follow this guide: <a href="https://militarycac.com/dodrootca2.pdf">https://militarycac.com/dodrootca2.pdf</a>

### Additional Guidance

(Visual guide on next page)

- Close Firefox / Waterfox and restart it. Verify functionality by accessing a CAC restricted website like (<a href="https://www.dmdc.osd.mil/milconnect">https://www.dmdc.osd.mil/milconnect</a>) and selecting the CAC option for logging in.
- You will be prompted with a message the Connection is Untrusted the first time you go to a new DoD website
- Examples are found on the next slide.
- Firefox / Waterfox will ask you each and every time you go to visit a new or different DoD website to Confirm the Security Exception (aka, the certificate).

## Once confirmed you should see the website you are trying to access.

#### YOU ARE ACCESSING A U.S. GOVERNMENT (USG) INFORMATION SYSTEM (IS) THAT IS PROVIDED FOR USG-AUTHORIZED USE ONLY.

By using this IS (which includes any device attached to this IS), you consent to the following conditions:

- The USG routinely intercepts and monitors communications on this IS for purposes including, but not limited to, penetration testing,
   COMSEC monitoring, network operations and defense, personnel misconduct (PM), law enforcement (LE), and counterintelligence (CI) investigations.
- o At any time, the USG may inspect and seize data stored on this IS.
- Communications using, or data stored on, this IS are not private, are subject to routine monitoring, interception, and search, and may be disclosed or used for any USG-authorized purpose.
- This IS includes security measures (e.g., authentication and access controls) to protect USG interests--not for your personal benefit or privacy.
- Ontwithstanding the above, using this IS does not constitute consent to PM, LE or CI investigative searching or monitoring of the content of privileged communications, or work product, related to personal representation or services by attorneys, psychotherapists, or clergy, and their assistants. Such communications and work product are private and confidential. See User Agreement for details.

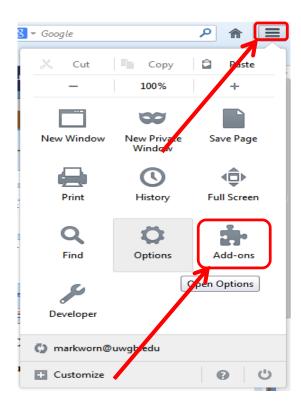


NOTE: If you have problems accessing Mail.mil (or want the ability to digitally encrypt emails), follow the next few slides

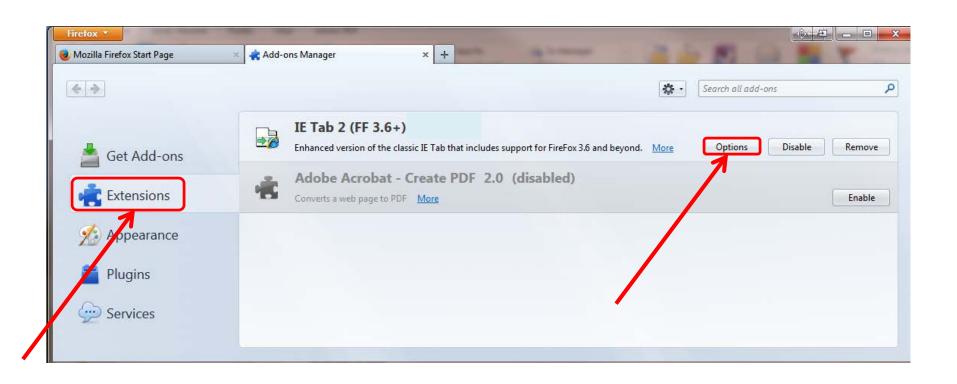
# IE Tab V2 extension information / configuration which gives you Internet Explorer type flexibility in your FF/WF web browser (example S/MIME options)

- The IE Tab V2 (Enhanced IE Tab) plugin gives you the functionality of Internet Explorer without opening Internet Explorer.
- Download: <a href="https://addons.mozilla.org/en-US/firefox/addon/ie-tab-2-ff-36/">https://addons.mozilla.org/en-US/firefox/addon/ie-tab-2-ff-36/</a>

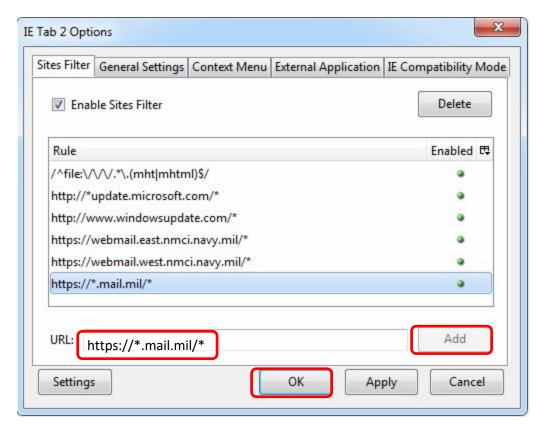
# IE tab additional configuration Open Firefox (or Waterfox), Select the 3 parallel lines, followed by *Add-ons*



# Select Extensions, IE Tab 2 (FF 3.6+), Options



# Mail.mil users, type "https://\*.mail.mil/\*" (without the quotes) in the URL (box), select Add, then OK



Examples show for Navy personnel. Other military branches may need to add their OWA URLs. Recommend adding /\* at the end of the URL

### Attempt to access your CAC enabled email

Mail.mil <a href="https://web.mail.mil">https://web.mail.mil</a>

Once you are in, try to send a digitally encrypted email.

### Presentation created and maintained by: Michael J. Danberry

https://MilitaryCAC.com

If you still have questions, visit:

https://militarycac.com/questions.htm