



Profile Manager

(with special guests Apple Configurator)

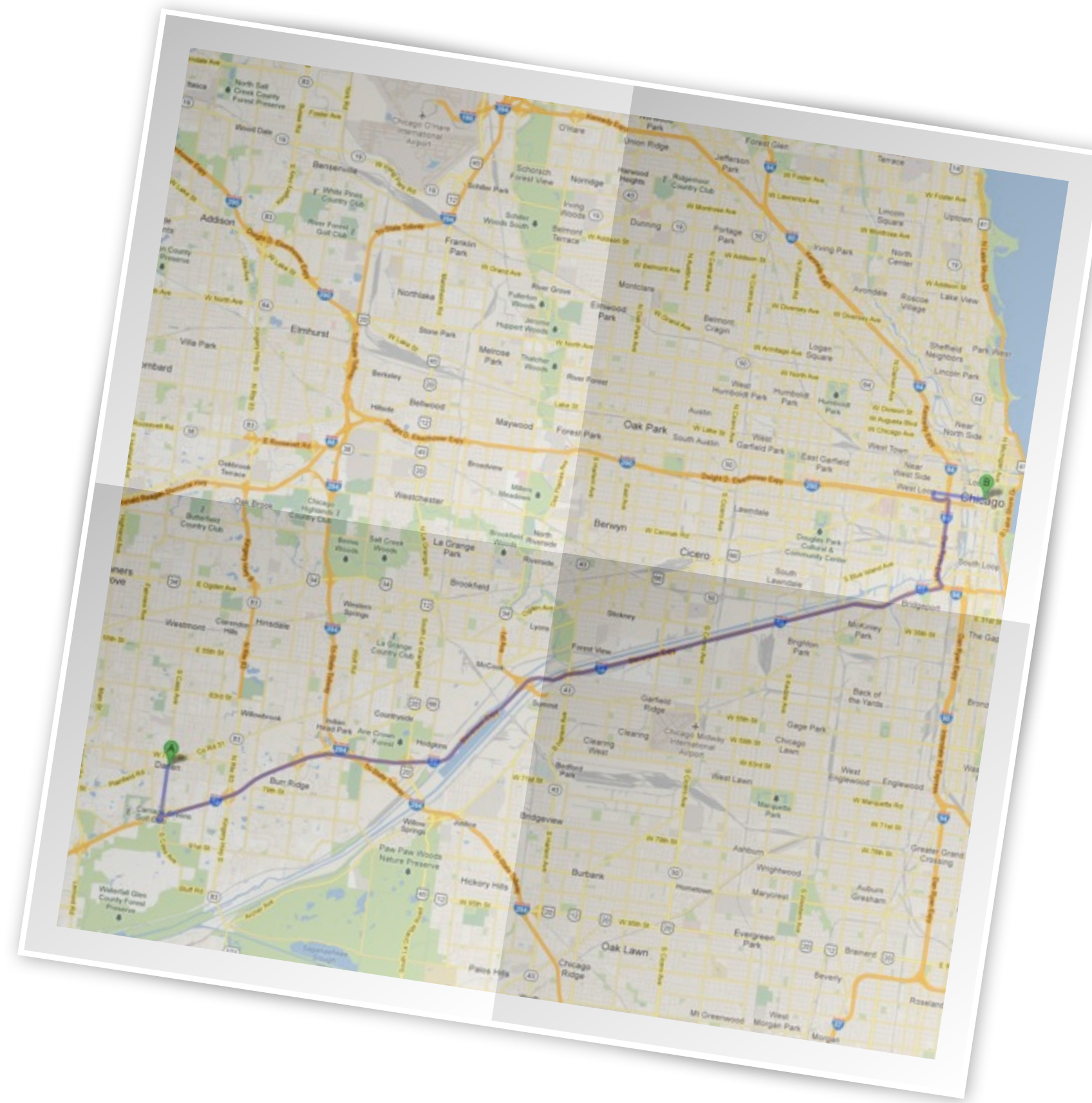
Andrew MacKenzie
Capstan Networks LLC
@andrewmac



Andrew MacKenzie

Founder, Capstan Networks, LLC

- High School Computer Teacher
- Apple Education Systems Engineer



Getting Started with Profile Manager

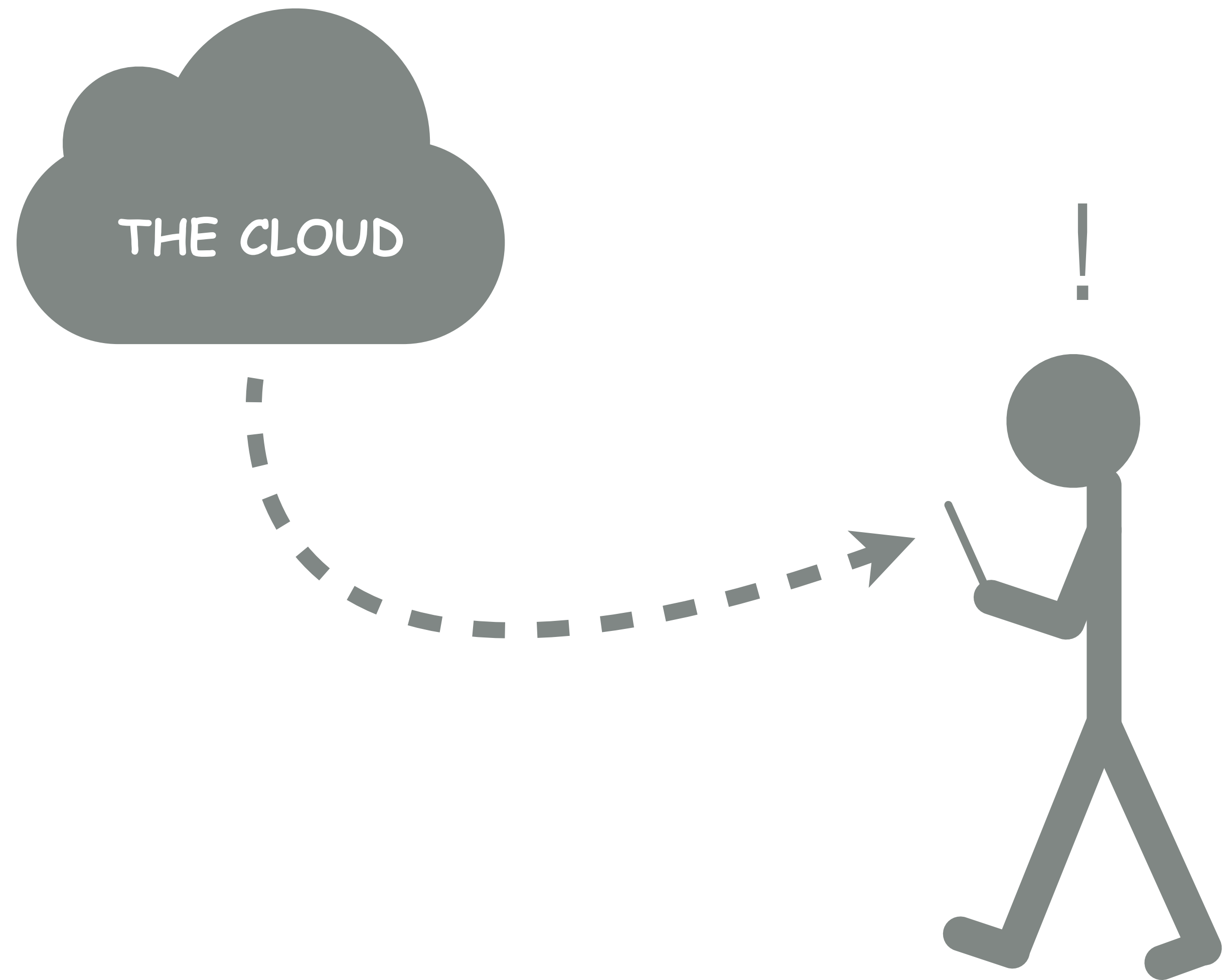
Helpful resources for starting out

- ▶ *Managing iOS Devices with OS X Lion Server*, by Arek Dreyer (Kindle, iBooks)
- ▶ *OS X Lion Server Essentials*, by Arek Dreyer and Ben Greisler (Apple Pro Training Series)
- ▶ Anything and everything at <http://krypted.com>, by Charles Edge

The Goal

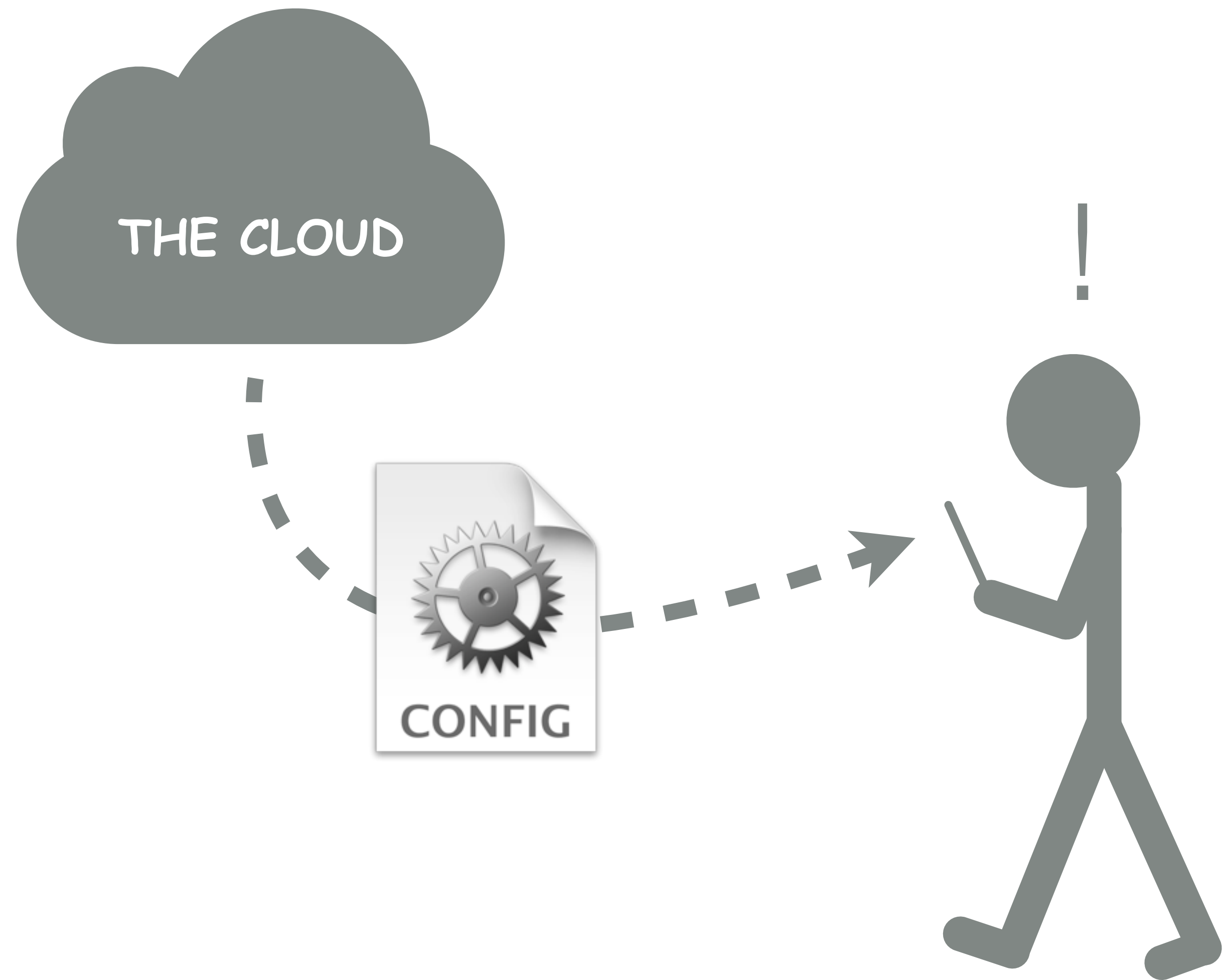
Your settings, pushed to your managed devices, over the air.

- WiFi network access
- App restrictions
- Configured email accounts
- Web Clips
- Passcode requirements



Configuration Profiles

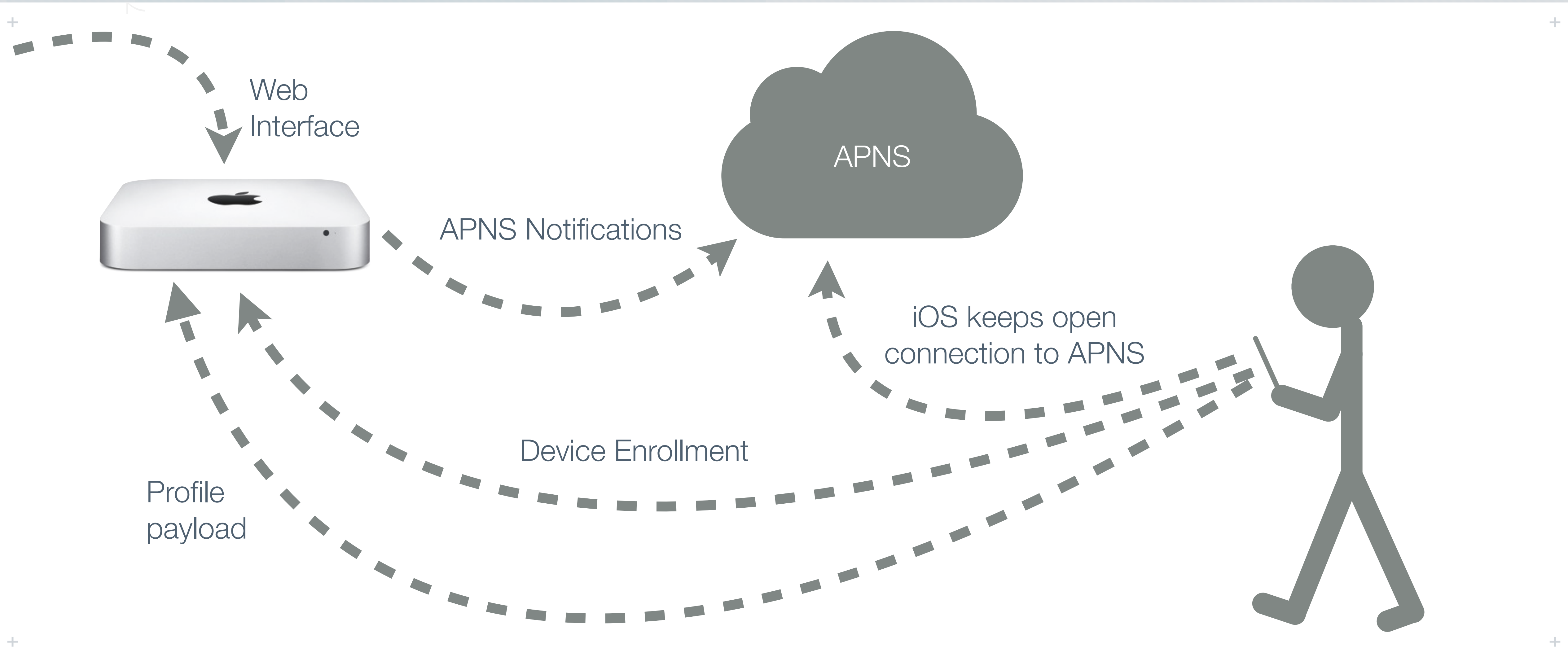
- XML files (.mobileconfig)
- Payloads define groups of settings
- Distributed via
 - web
 - email
 - SMS
 - USB
 - **OTA via MDM**



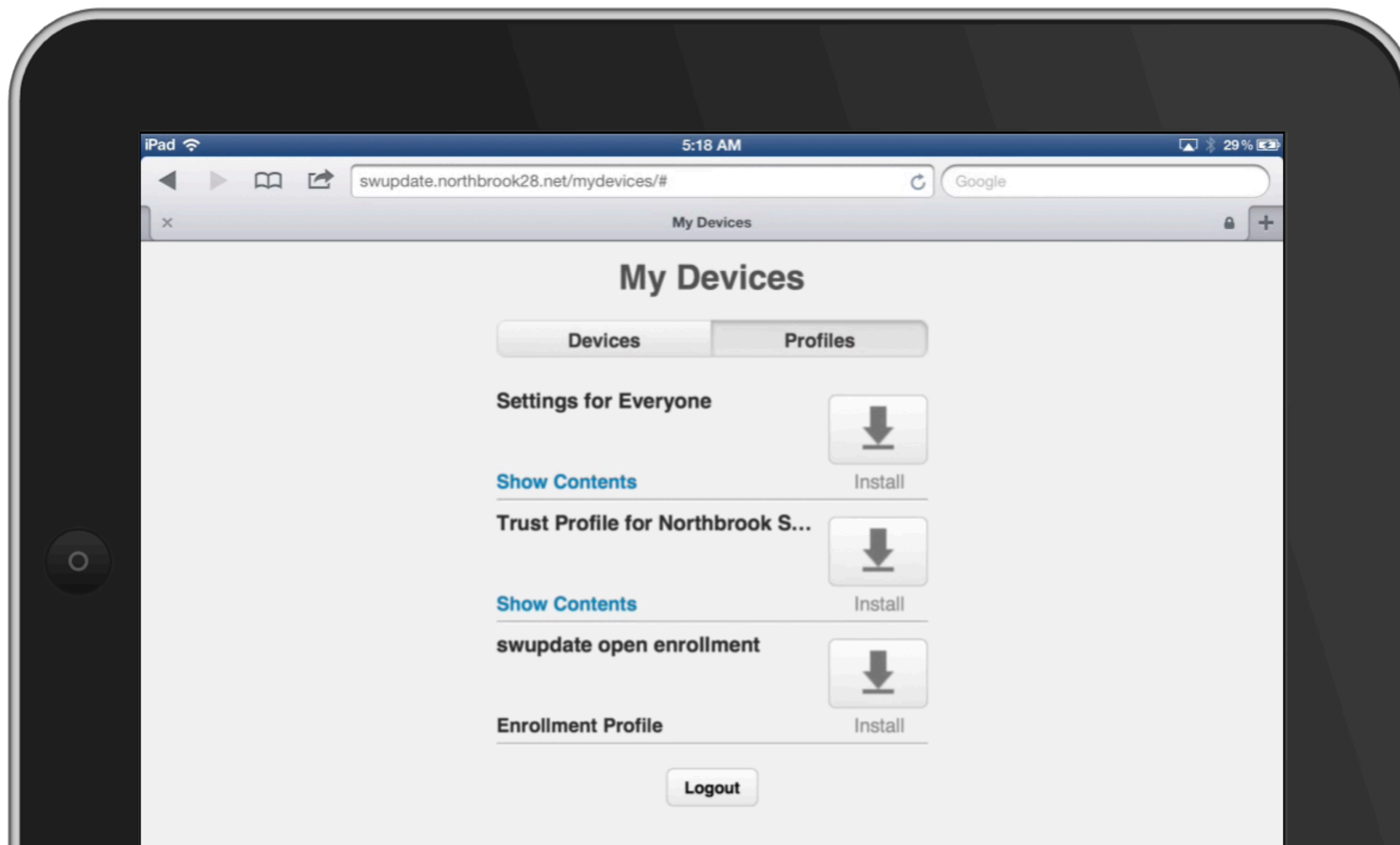
Profile Manager

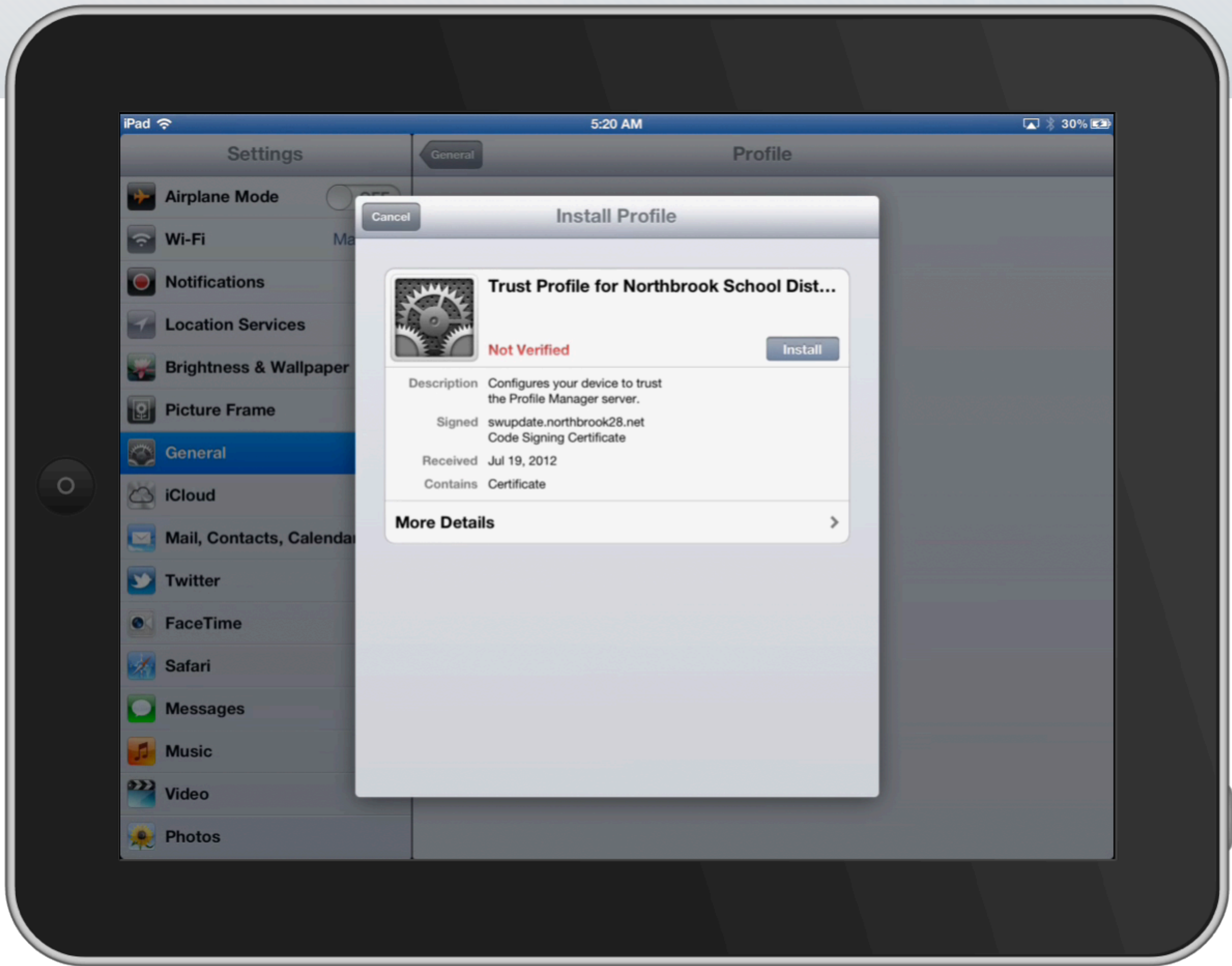
- Create and edit Profiles
- Push OTA to iOS and OS X (10.7+)
- Web-based administration
- Self-Service Portal for assigned or enrolled devices
 - Wipe
 - Lock
 - Reset Passcode



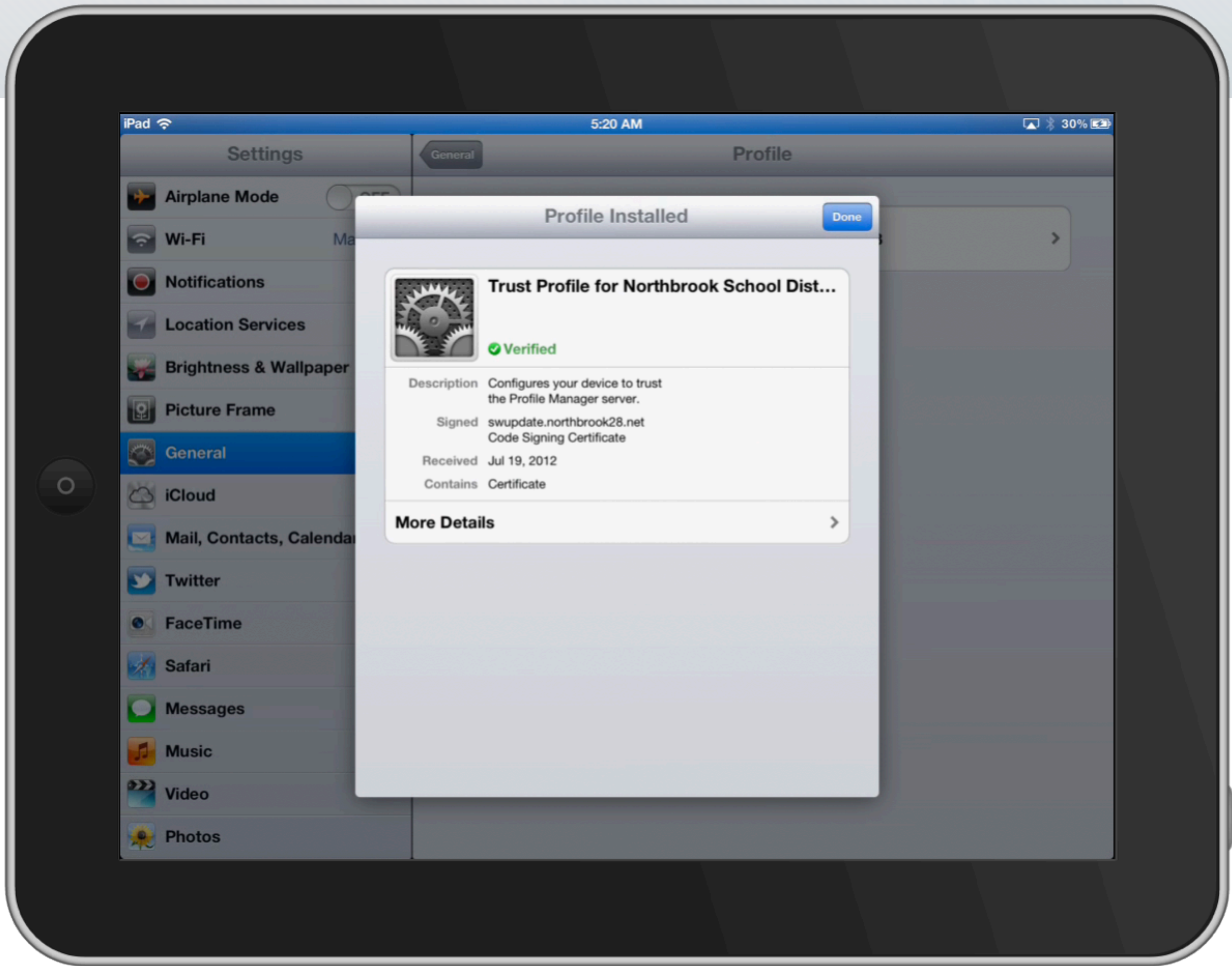


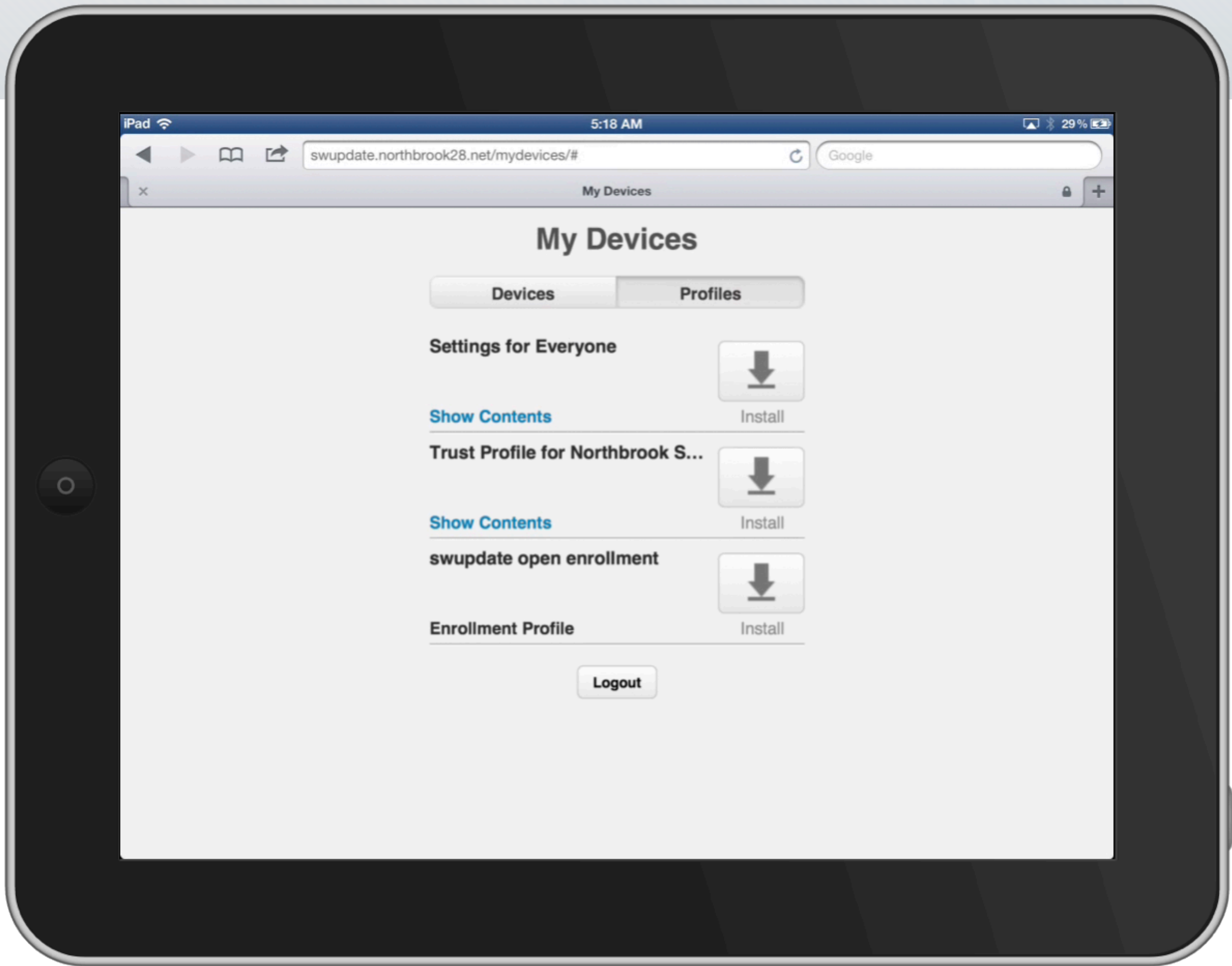
Enrolling Devices in 10 Easy Taps

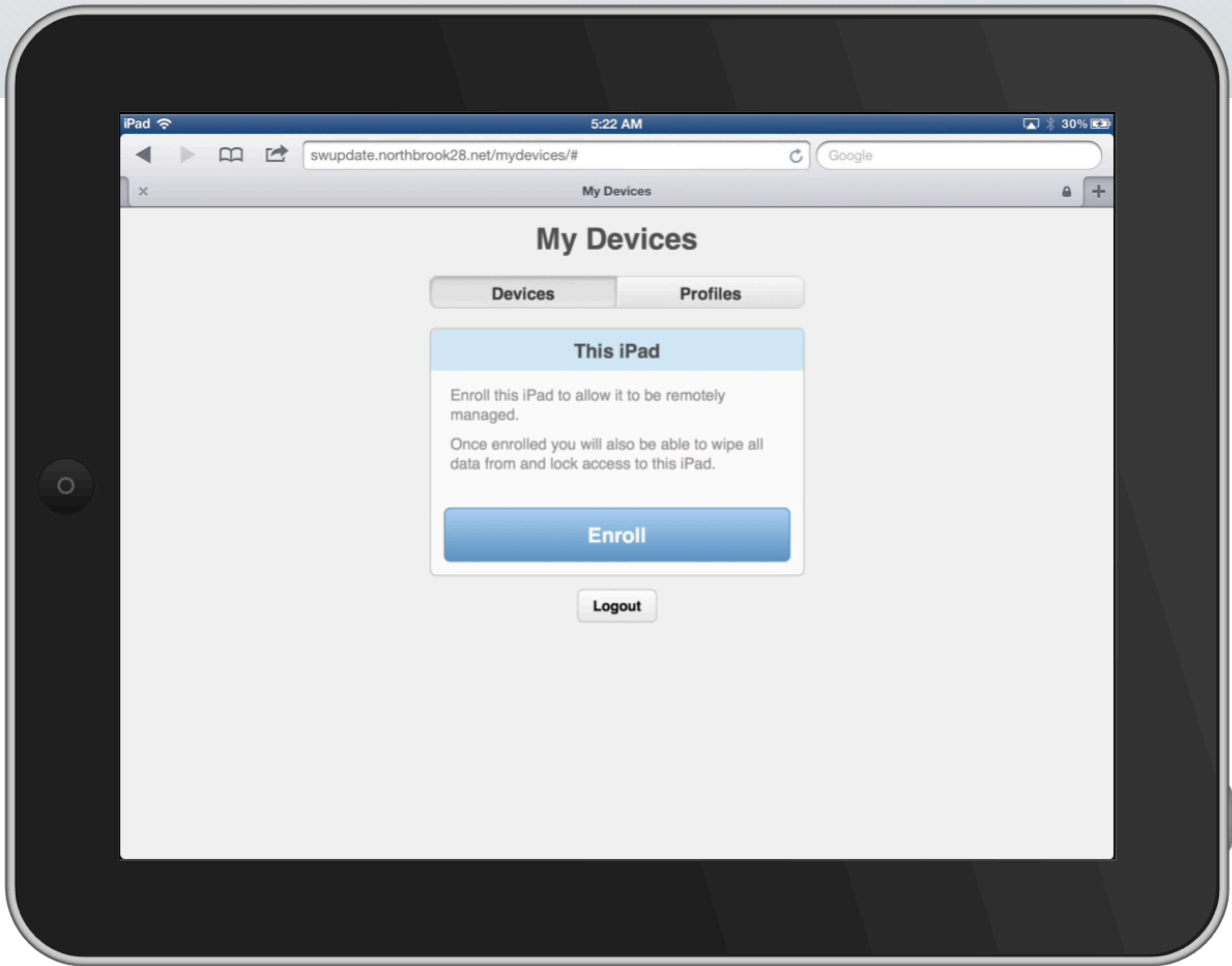


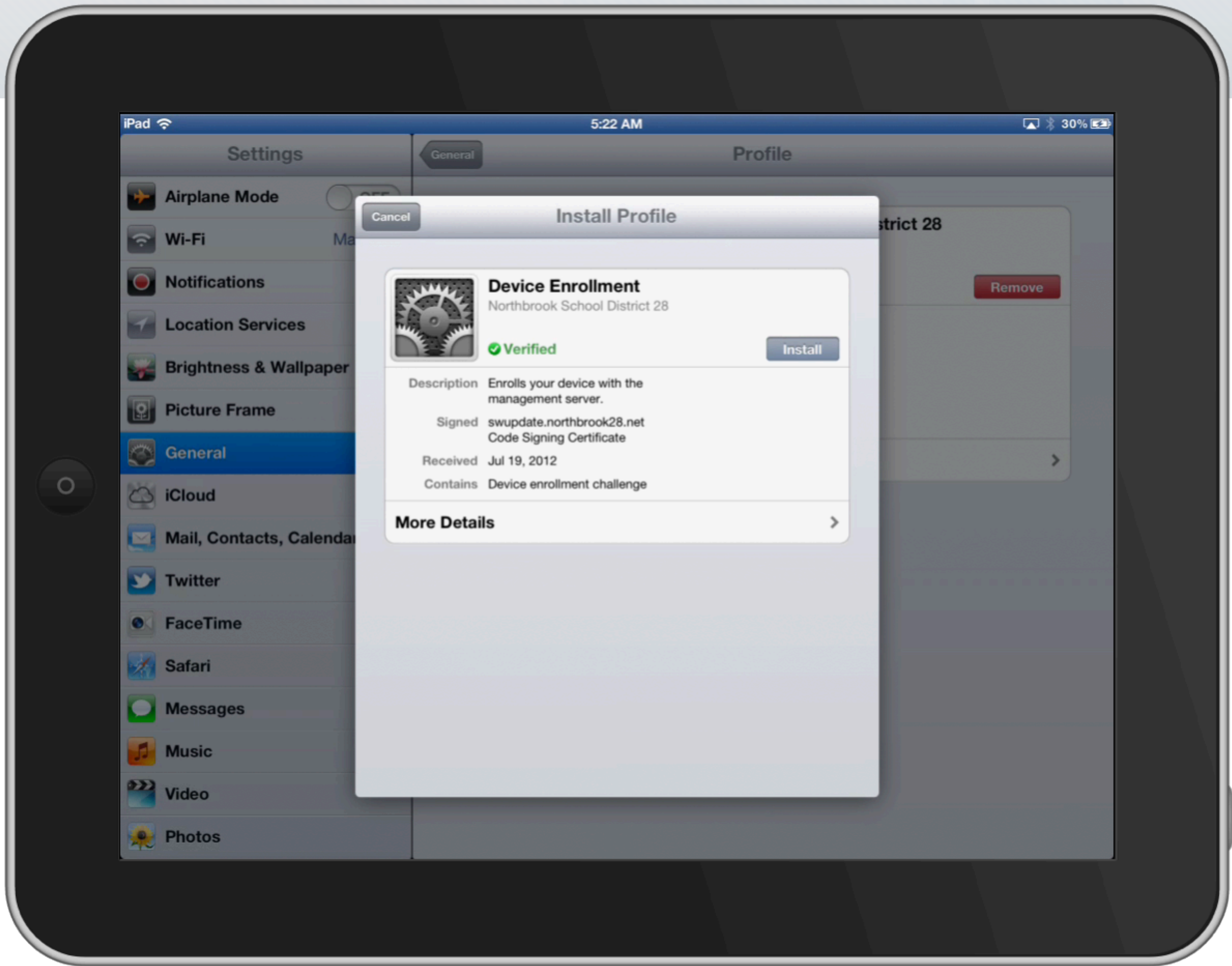


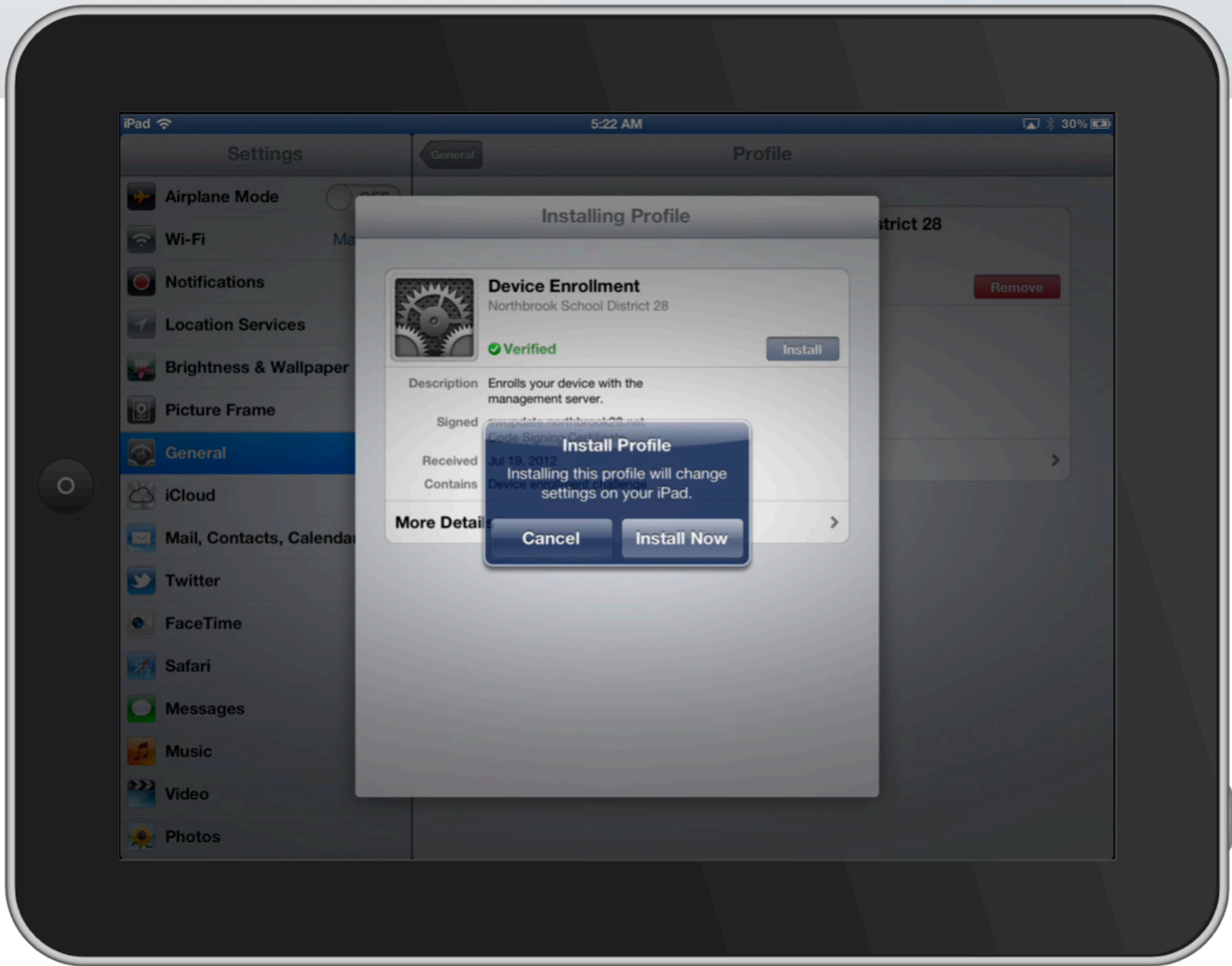


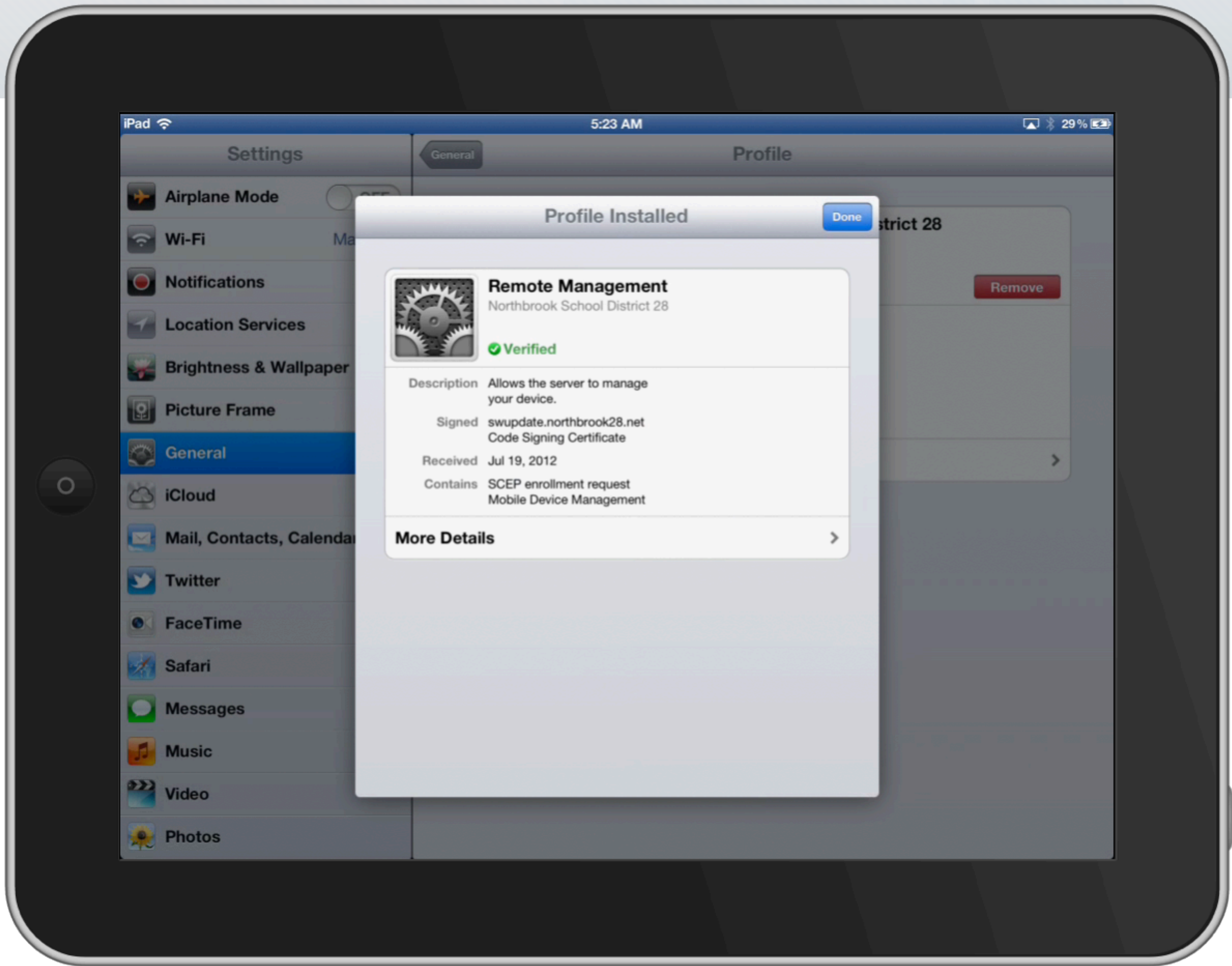


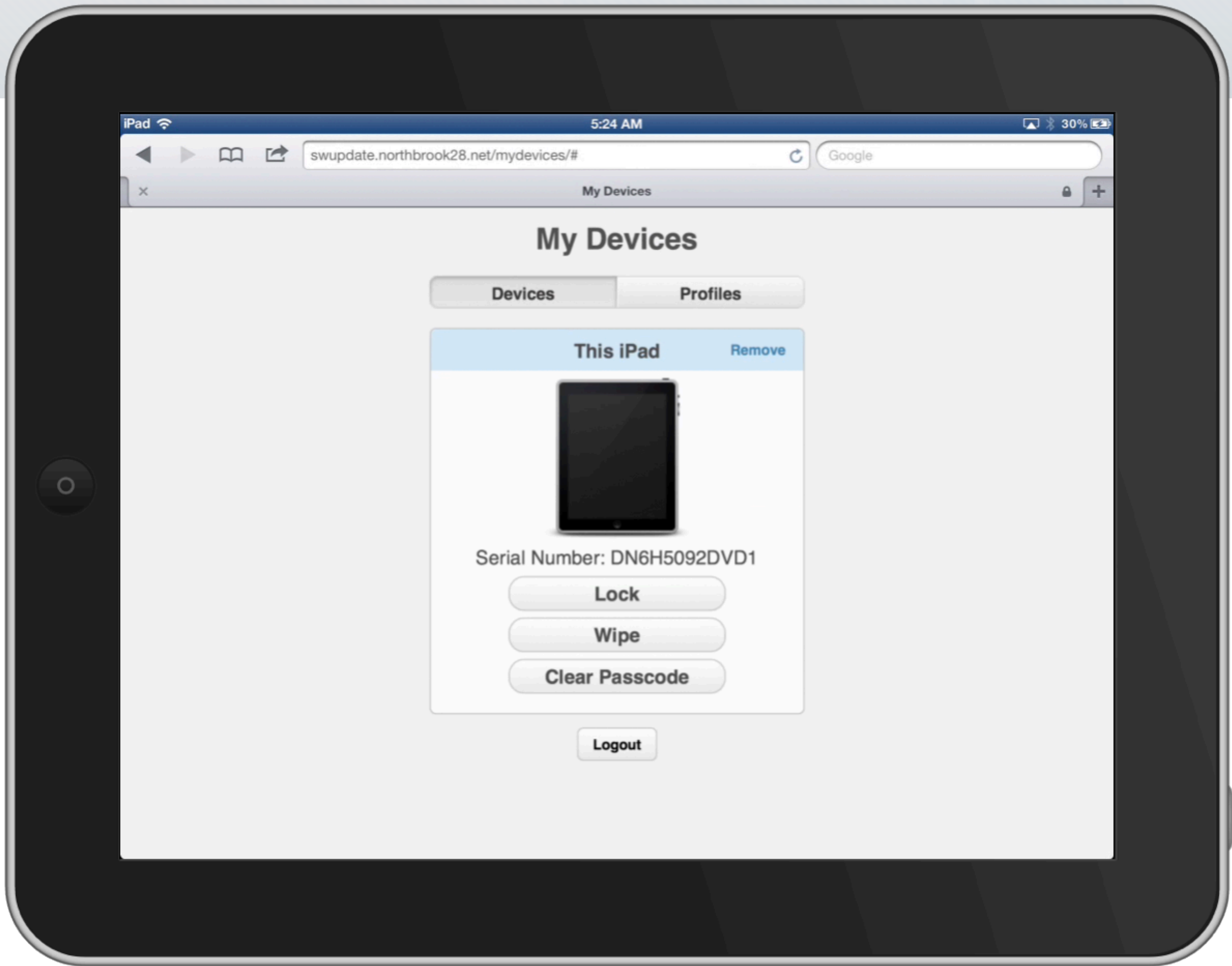




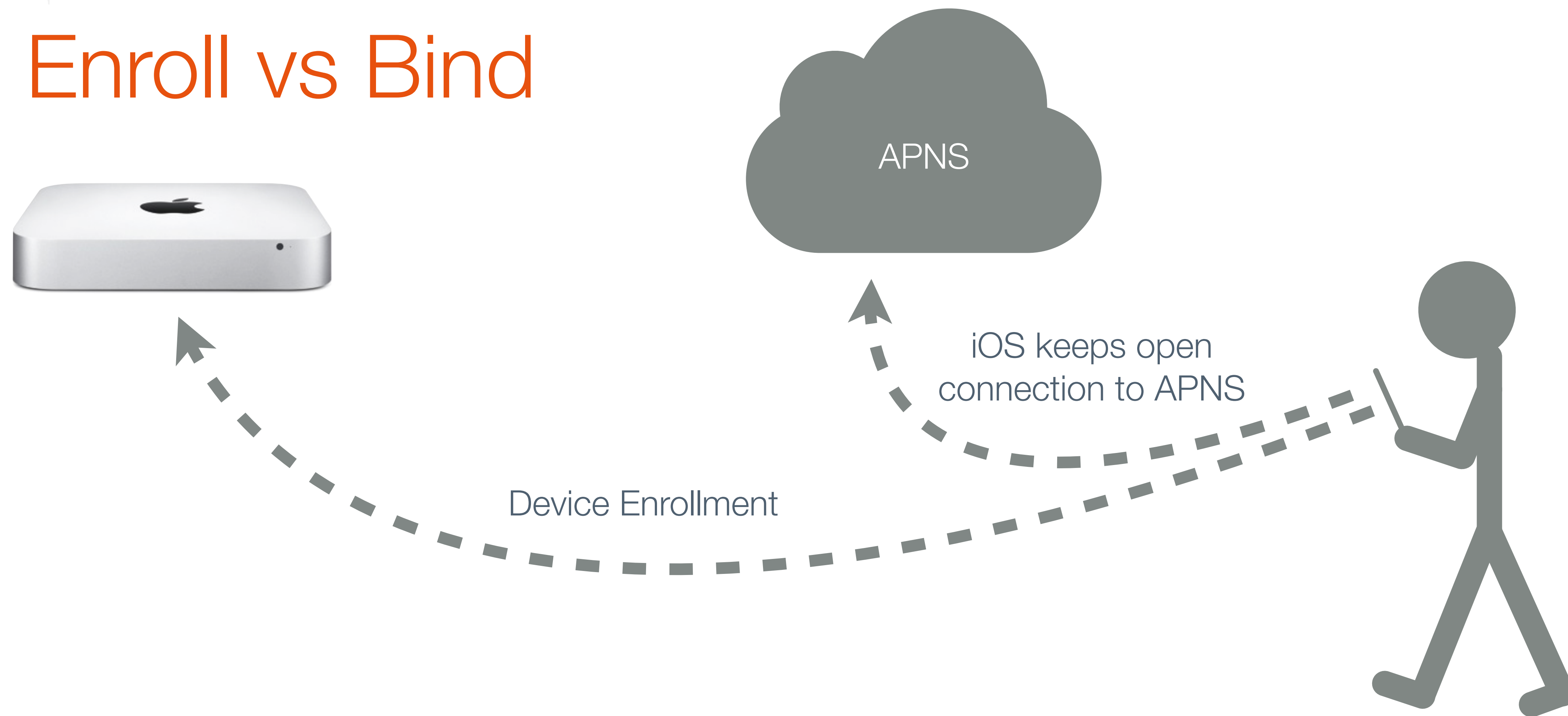




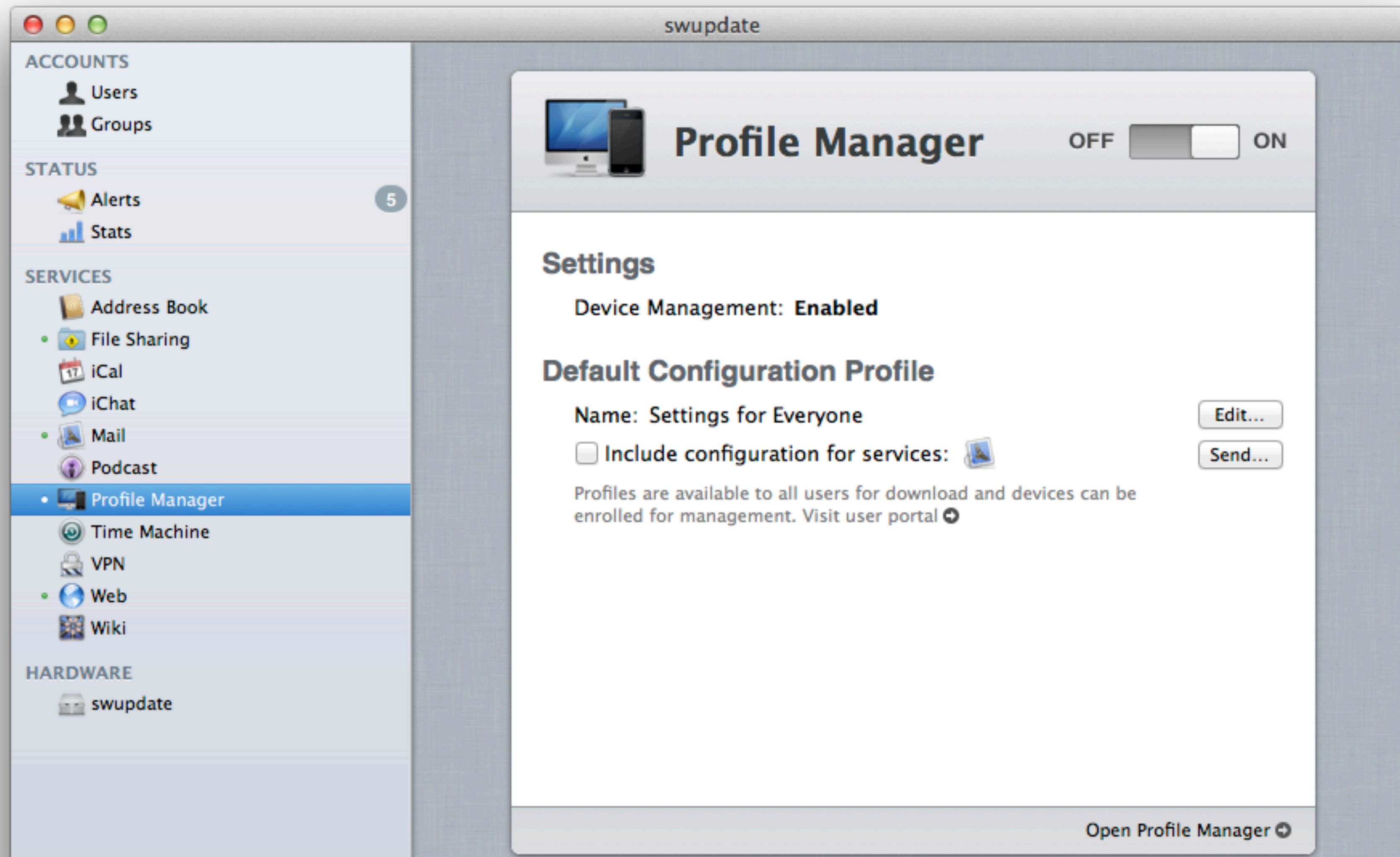




Enroll vs Bind



Web-Based Administration



Web-Based Administration

The screenshot displays a web browser window titled "Profile Manager: User Group: Everyone". The address bar shows the URL https://swupdate.northbrook28.net/profilemanager/#/user_group/ABCDEFAB-CDEF-ABCD-EFAB-. The browser's search bar contains the text "Google".

The web application interface includes a top navigation bar with the "Profile Manager" logo, a search bar, and a user dropdown menu showing "localadmin".

The left sidebar is divided into three sections:

- LIBRARY**: Contains links for "Devices", "Device Groups", "Users", and "Groups" (which is currently selected).
- ACTIVITY**: Contains links for "Active Tasks" and "Completed Tasks".
- ENROLLMENT PROFILES**: Contains a link for "swupdate open enrollment".

The main content area is titled "Everyone" and "All Users". It features a tabbed interface with tabs for "Profile", "Members", "Activity", "About", and "Apps". The "Profile" tab is active, displaying "Settings for Everyone".

Below the "Settings for Everyone" header, there is a "General" section with a "Download" button and an "Edit" button.

A list of user groups is visible on the left side of the main content area:

- Everyone**: All Users
- Workgroup**: 4 Members
- JH Staff**: 116 Members
- GB Staff**: 55 Members
- NB28 All Staff**: 9 Members
- JH Tech Staff**: 6 Members
- WM Staff**: 59 Members
- MB Staff**: 57 Members
- JH Class of 2010**



Settings for All Instructional iPads

3 Payloads Configured – Updated 05/17/12 at 2:12 PM

Mac OS X and iOS



General

1 Payload Configured



Passcode

Not Configured



Network

Not Configured



VPN

Not Configured



Certificate

Not Configured



SCEP

Not Configured



Security & Privacy

Not Configured

iOS



Restrictions

1 Payload Configured



Email

Not Configured

Functionality

Applications

Media Content

- ☒ Allow use of camera
 - ☒ Allow FaceTime
- ☐ Allow Photo Stream
- ☒ Allow screen capture
- ☒ Allow installing apps
- ☐ Allow in App Purchase
- ☐ Require iTunes password for all purchases
- ☐ Allow multiplayer gaming
- ☐ Allow adding Game Center friends
- ☐ Allow iCloud backup
- ☐ Allow iCloud document syncing
- ☐ Allow automatic sync while roaming
- ☐ Allow voice dialing
- ☐ Force encrypted backups
- ☒ Allow accepting untrusted TLS certificates
- ☒ Allow Siri
 - ☒ Allow Siri while locked

Cancel

OK

Profile Manager: Device Group: Settings for All Instructional iPads

https://swupdate.northbrook28.net/profilemanager/#/device_group/4/ Google

Profile Manager: Device Group: Se...

Settings for All Instructional iPads

3 Payloads Configured – Updated 05/17/12 at 2:12 PM

Mac OS X and iOS

- General**
1 Payload Configured
- Passcode**
Not Configured
- Network**
Not Configured
- VPN**
Not Configured
- Certificate**
Not Configured
- SCEP**
Not Configured
- Security & Privacy**
Not Configured

iOS

- Restrictions**
1 Payload Configured
- Email**
Not Configured

Functionality Applications Media Content

- ☐ Allow use of YouTube
- ☐ Allow use of iTunes Music Store
- ☒ Allow use of Safari
 - ☒ Enable autofill
 - ☐ Force fraud warning
 - ☒ Enable JavaScript
 - ☐ Block pop-ups

Accept Cookies

From Visited Sites

Cancel OK

Profile Manager: Device Group: Settings for JH iPads

https://swupdate.northbrook28.net/profilemanager/#/device_group/6/

Google

Profile Manager: Device Group: Se...

Profile Manager

admin

LIBRARY

Device

Device

Users

Groups


ACTIVITY

Active

Compl

ENROLLME


swupd





Settings for JH iPads


4 Payloads Configured – Updated 06/13/12 at 11:28 AM


Mac OS X and iOS


**General**
1 Payload Configured


**Passcode**
Not Configured

**Network**
Not Configured


**VPN**
Not Configured


**Certificate**
Not Configured

**SCEP**
Not Configured

**Security & Privacy**
Not Configured

iOS

**Restrictions**
1 Payload Configured

**Email**
1 Payload Configured

Account Description
The display name of the account (e.g. "Company Mail Account")

Account Type
The protocol for accessing the email account
IMAP Path Prefix:

User Display Name
The display name of the user (e.g. "John Appleseed")

Email Address
The address of the account (e.g. "john@company.com")

☒ **Allow messages to be moved**
Messages can be moved out of this email account into another

☐ **Use Only in Mail**
Send outgoing mail from this account only from Mail app

Incoming Mail

Outgoing Mail

Mail Server and Port
Hostname or IP address, and port number for incoming mail
 :

Cancel

OK

Profile Manager: Device Group: Settings for JH iPads

https://swupdate.northbrook28.net/profilemanager/#/device_group/6/

Google

Profile Manager: Device Group: Se...

Profile Manager

admin

LIBRARY

Device

Device

Users

Groups


ACTIVITY

Active

Compl


ENROLLME


swupd





Settings for JH iPads


4 Payloads Configured – Updated 06/13/12 at 11:28 AM


**Exchange**
Not Configured


**LDAP**
Not Configured

**CardDAV**
Not Configured


**CalDAV**
Not Configured


**Subscribed Calendars**
Not Configured


**Web Clips**
1 Payload Configured

**APN**
Not Configured

Mac OS X

**Restrictions**
Not Configured

**Directory**
Not Configured

**Login Window**
Not Configured

Label

The name to display for the Web Clip

NBJH

URL

The URL to be displayed when opening the Web Clip


http://www.northbrook28.net/nbjh

☐ **Removable (iOS only)**

Enable removal of the Web Clip

Icon

The icon to use for the Web Clip



Choose...

☒ **Precomposed Icon (iOS only)**

The icon will be displayed with no added visual effects

☐ **Full Screen (iOS only)**

Displays the web clip as a full screen application

Cancel

OK

Disallow YouTube



Disallow YouTube



Management Perspectives

- Manage by User
 - Devices *assigned to* that user
 - Devices *enrolled by* that user
- Manage by Group
 - Manages all devices assigned to or enrolled by users in a group
- Manage by Device
- Manage by Device Group

Reporting from Profile Manager

Remotely view and verify settings on devices

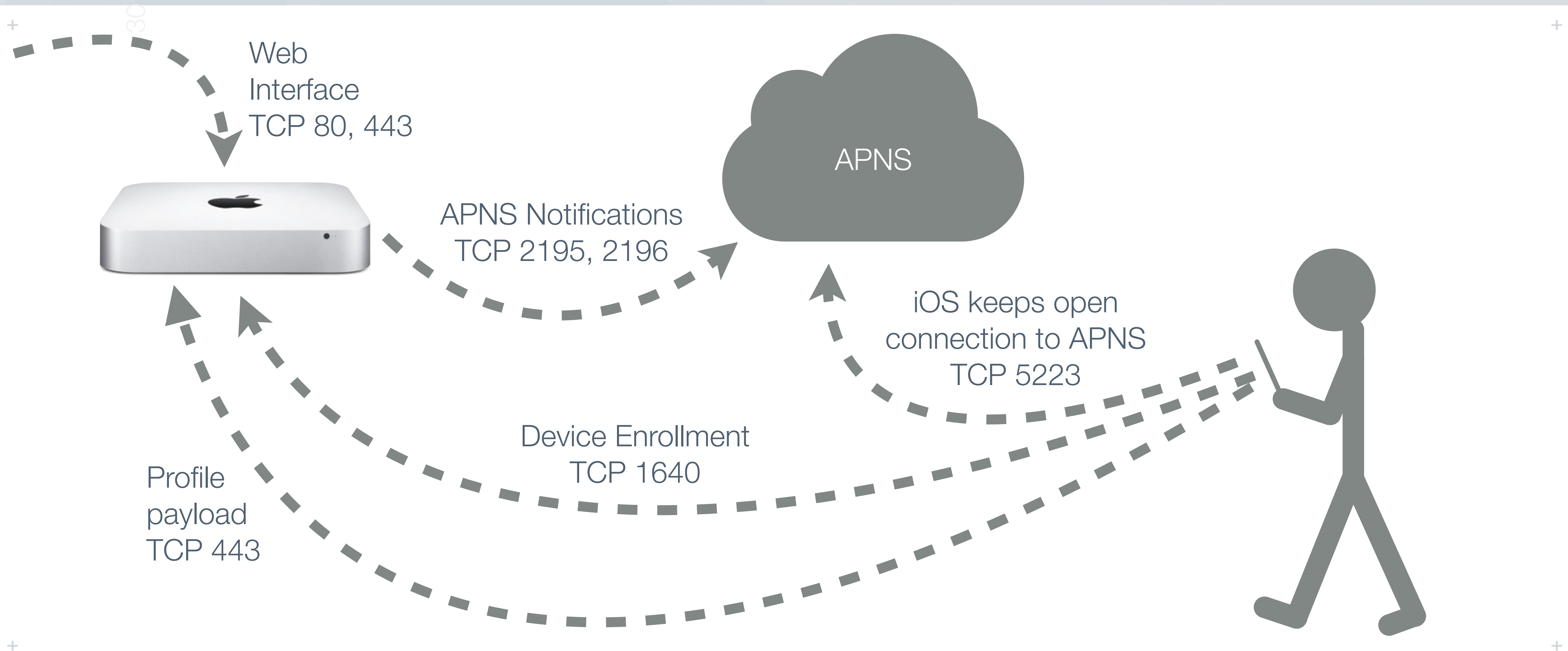
- ▶ Device Details
 - ▶ Model, OS version, serial number
- ▶ Installed Applications
- ▶ Installed Configuration Profiles



Open Ports for Profile Manager

See <http://support.apple.com/kb/HT5302>

- TCP 2195, 2196 Used by Profile Manager to send push notifications
- TCP 5223 Used to maintain a persistent connection to APNs and *receive* push notifications
- TCP 80, 443 Provides access to the web interface for Profile Manager admin
- TCP 1640 Enrollment access to the Certificate Authority



Lion Server Fresh Install

See <http://support.apple.com/kb/HT4766>

- ▶ Format your disk Mac OS X Extended (Journaled)
- ▶ Prepare external drive with Lion and Lion Server installer apps in /Applications
- ▶ Launch Lion Server installer *once*, and let it download additional resources
- ▶ Install Lion on your formatted drive, and Customize button will offer Lion Server

Apple Configurator

Top Features

- ▶ Available on App Store
- ▶ Create Configuration Profiles
 - ▶ Push to connected devices over USB
- ▶ Easy to use to enroll a whole cart of devices into MDM
- ▶ Icon isn't blue



Prepare

Use to prepare devices for individual use

- Use for devices that will *not* return to you
- Update to latest iOS
- Optionally restore backup (set default settings)
- Optionally install profiles



Supervise

Sweet Spot - Use to prepare devices for community use

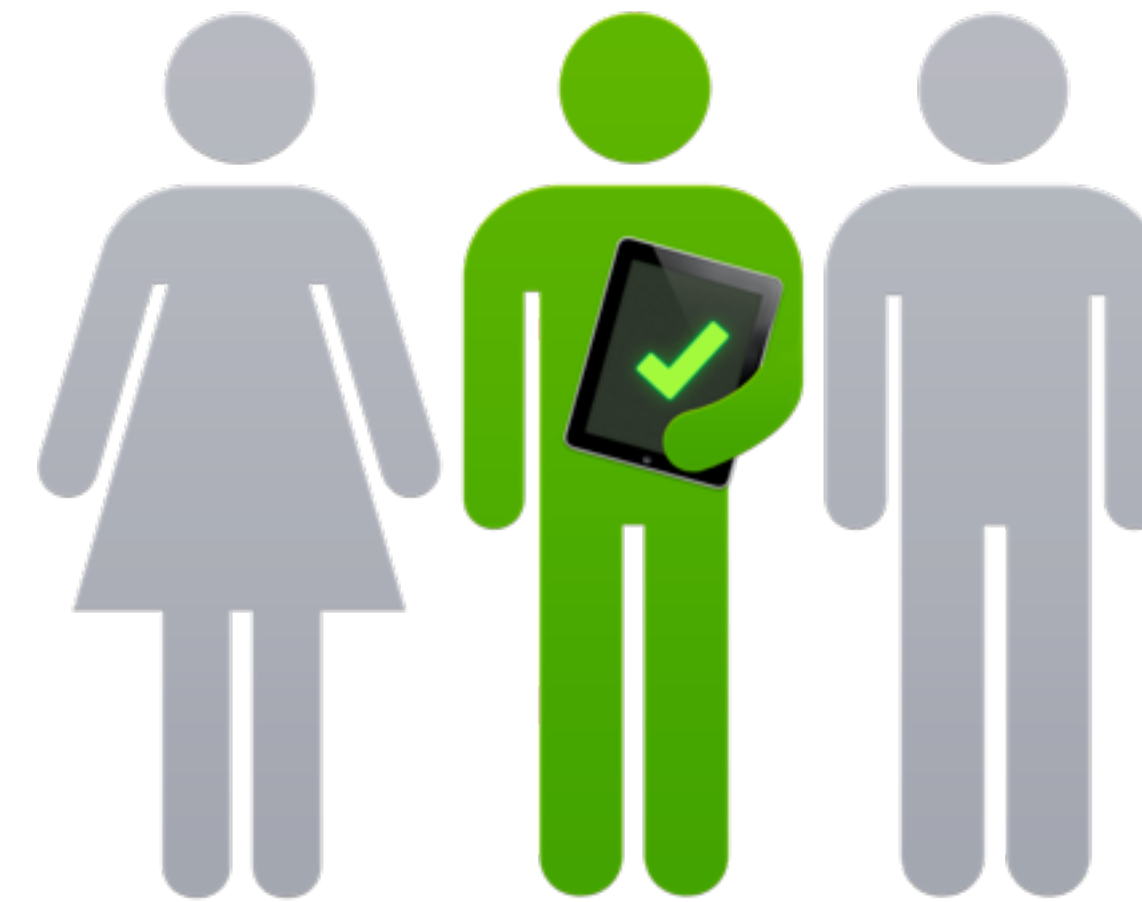
- Name devices sequentially
- Update iOS
- Optionally restore backup (set default settings)
- Install Free and VPP apps
 - Maintain control of VPP licenses



Assign

Supervised devices checked out to individuals

- ▶ Allows you to check-out devices
- ▶ Distribute documents
- ▶ Gather documents



Enrolling Devices with Configurator



Apple Configurator + Profile Manager

Use Configurator to:

- Update iOS on multiple devices
- Push Enrollment and Trust Profiles
- Manage Free and VPP Apps

Use Profile Manager to:

- Enforce policy and restrictions
- Configure per-user or generic email accounts
- Add Web Clips
- Add or Configure Wi-Fi networks





Thanks.

