MTConnect Python Adapter

## Goal:

Make a standalone MTC adapter that continuously loops and updates data items. Use online resources detailing Python adapters to develop the adapter in Python.

## Notes:

* Adapter will be run on the PC, rather than a machine device
* Changes in data items will be nominal and only for proof-of-concept and demonstration
* The end goal would to be to have both a standalone MTC agent and adapter on a PC for an all-in-one MTC demonstration that could be used during MTC training session, or have the adapter on an ARM based processor (RaspberryPi) in a SmartBox that could be used for an SmartBox and MTC demo at shows

Adapter

Agent

Application

XML

SHDR

* RaspberryPi is Linux based, meaning the Python language is already built into it and it could run an adapter programmed with Python
* RaspberryPi’s generally have GPIO boards (General Purpose Input/Output) that can be measured and recorded as data items for MTConnect
* For additional documentation on Adapter to Agent communication, review “SHDR” documentation on MTCUP website
* The Agent communicates to the application via XML, however the Standards Committee is experimenting with a version that communicates via JSON