CPE Developer Days

April 30, 2008

The MITRE Corporation
Bedford, MA

Agenda

Wednesday April 30th 2008

9:00 - 9:15 **welcome**

- *Introductions*
- *MITRE's Role*
- *Goals for the Day*

9:15 - 9:45 **overview**

- *History of CPE*
- *Overview of Current Spec*

9:45 - 10:30 **discussion – use cases**

This discussion will start with a review of the use cases currently outlined in the spec. Once we have gone over these use cases, additional use cases can be proposed and discussed. The goal of this discussion is to better understand the use cases that drive CPE and what types of requirements need to considered.

- Topics:
  - current use cases
  - additional use cases
  - changes required for support

10:45 - 12:00 **discussion – official dictionary**

The Official CPE Dictionary (hosted by NIST) currently contains all the CPE Names that have been vetted by the community. This discussion will attempt to explore ways to make the current dictionary more useful and available. Is there a single best way to provide continuous updates of CPE Names? Or is a combination of different methods more appropriate? We will discuss what should the end state might look like? In addition, we will discuss future plans to make it easier for community members to submit new CPE Names and how vendors can help maintain the CPE Names related to their own products.

- Topics:
  - current status
  - ways to improved information access
  - improving the submission process

12:00 - 1:00 **lunch**

1:00 – 2:15 **working session**

- *Aliases*

  A proposal that has come up in the past is to support aliases within CPE Names. This would allow names to point to other related names.

- *Wildcards*

  One of the known issues with Version 2 is the inability to identify platform types related to a given range of versions. For example, all releases earlier than version 5.6. The reason for this shortcoming was that we could not figure out a way to abstract version information into a set hierarchy. While the rollup property of CPE addresses inclusiveness of all products, versions, updates, and editions, an equivalent property internal to each component is not available.

- *Abbreviations*

  In the current CPE Specification, use of certain abbreviations is encouraged. We will discuss the rationale and justification for abbreviations. Is this something that has been a positive for CPE or rather has it been more of a burden for those creating names? What would be the cost/loss of removing the idea of abbreviations?

2:30 - 3:00 **discussion – major version transition**

The release of a new major version will mean challenges related to the transition. To support those in the community already using CPE, a mapping will have to be created. What is the best way to publish this mapping? What other types of support would be needed by users, and what sort of timeframes would be reasonable? This session will work through these questions with the users who will need to make this type of a transition.

- Topics:
  - current versioning rules
  - transition strategies

3:15 - 4:30 **working session**

- *CPE Coverage*

  Should the coverage of CPE be expanded? Currently the specification declares hardware, operating systems, and applications as valid parts. Suggestions to expand have included drivers, libraries, patches, and virtual systems. We will also discuss the opposite end of the spectrum and ask what value there is in identifying CPE parts. What purpose do these part identifiers serve, and what capabilities would be lost if they are done away with?

- *Numerical Identifiers*

  CPE currently uses a URI to encode a CPE Name. The URI structure is built by using information like vendor name, product name, and the version of the platform type being identified. This structure allows mapping of similar CPE Names based solely on the names themselves. (no need to retrieve additional info) Unfortunately, the URI format also leads to confusion around the creation of new identifiers. Things like spelling and marketing terms make determining the correct URI difficult. In addition, changes in vendor names and product names due to acquisitions and mergers also throw a wrench into the whole process.

- *Using a Tagged Approach*

In conjunction with the numerical identifier conversation above, or due solely for a desire to associate more information with a given CPE Name, one idea that has been discussed often is using tags. The basic theory would be that each CPE Name could be associated with additional information by using the appropriate tags for the data. Information like titles, vendors, marketing names, etc. could be associated with a given CPE Name. The biggest question is whether CPE as an initiative wants to take on the responsibility of associating additional data with a name, or if it just wants to focus on the task of creating a unique identifier for a given platform type. (and leave the additional data problem to someone else)

4:30 - 4:45 **discussion – cpe compatibility**

Is there a desire for a CPE Compatibility Program similar to the programs offered by other initiatives? If so, what would be the goals of this program and how would it be set up? Hopefully this discussion will give us all a clear understanding of what the CPE Community desires and if warranted, will allow the design of a program to be undertaken.

- Topics:
  - does the need exist

4:45 - 5:00 **wrap-up**

- *Summary of Day's Accomplishments*