Java Micro Edition

Current state, and where are headed to?

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Java ME 8
State at launch

- Java ME 8 JSRs (360 and 361) finished in 2014
- Closed the gap between Java SE and ME
  - And the idea was to keep the gap narrow: “Java ME & Java SE release cycles are in sync” (J1 LAD 2015, by Simon Ritter)
- Defined a good Java platform for embedded devices
  - better device peripheral interfaces
  - multiple midlets running in the same environment
  - well defined lifecycle for midlets, isolation of underlying HW
  - unique over-the-air update with guarantees that made updates easy
Java ME 8

State at launch

- Embedded devices in this case are really small, such as 256 kB RAM and 1 MB ROM for the VM
  - Java SE 8 Embedded has 32MB RAM and 11MB ROM for the VM alone.
- "Bootstrap" support for Raspberry Pi and some HW vendors (like NXP (then Freescale), Qualcomm, STMicro)
- So Java ME 8 was a good progress with a lot of promises, such as keep SE/ME in sync.
- But, after 2 years…
Java ME 8
Current state - after 2 years

- Vendor support? Who sells modules with Java ME 8?
- Java ME “messengers” are gone (much like Java EE’s)
  - Oracle points to Terrence Barr’s and Hinkmond Wong's Weblogs, both no longer with Oracle
- No new Java ME content for JavaOne 2016, no JSR yet filled for it
Java ME 8
Current state - after 2 years

- Oracle is “quiet” about it for a while now:
  - When asked about “Oracle’s IoT strategy”, the presentation was a product (IoT CS) and not a platform such as Java SE/EE, at the June 15-16 2015 F2F meeting.
  - On the same meeting, “Mike said that we need a Java platform strategy that will benefit the entire Java ecosystem”

- I’ve been asking since August/2016 for a statement on Java ME future, but Oracle’s response is none
Java ME ...9?
Will there be a Java ME 9?

- If the idea before was to close the gap between Java SE and ME, are we to expect a Java ME 9?
- Maybe Java SE modularization will make ME irrelevant?
  - Or maybe we’ll just have Java SE Embedded and that’s it?
- What about the unique parts of ME, such as a well defined provisioning mechanism, security measures?
What would I like to see there

- Continue to close the gap between the languages (Stream support would be great)
- Support for emerging standards
  - REST client
  - Communication protocols such as MQTT and/or COAP
- Expansion of the Device IO capabilities
- Expansion of the OTA for new networks and protocols
- Continued support for multi-midlet environments