

MLDeviceType

github.com/webmachinelearning/webnn/issues/749

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Issues with MLDeviceType

- Fragmentation
 - website/app may work on some devices, fail on others
- Privacy
 - website can send progressively more complex programs to the ANE, GPU, etc, fingerprint the user
- Not implementable on Apple's platforms
 - We don't allow you to require the ANE

Proposal

- Remove MLDeviceType
- Allow browser implementations to make the best decision based on current workloads
 - Website/app has little insight into the rest of system workload
 - E.g., if rendering performance degrades, that is an implementor's potential issue to fix, not the website / web app
- Keep MLPowerPreference to prioritize power consumption over execution speed

Questions?