

The Lightspeed proposal satellite augmentation has a potential solution whereby the use of “microcells” or augmentation are permitted, ie, cellular base station operating with a maximum transmit power of say 0.5 watts. (*a guess on my part, but based on my direct experience with the AMPTS mobile system configuration when I was working with Ericsson in Melbourne (Australia) / Kista. (Sweden).*)

While this could probably affect GPS receivers within 10m or so of the terrestrial base station, it would appear pragmatic to see these installed at least 20m to 100m above the street – effectively eliminating any interference for ground level and airborne traffic as well.

The big downside is a massive investment in probably thousands of these microcells, and the ability of the Switching Centre(s) – routers to manage traffic in a usable manner and an electrically large network.

Network design constraints could also be “only” applied based on ‘blind’ spots from the satellites. This is unlikely to be workable, as most carriers will want to expand their traffic base (read revenues), and roll out terrestrial networks because that is a cheaper means of carrying the traffic.

Just some thoughts,

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