Excerpt of Expert Report of Seth Nielson, Ph.D.

Public Redacted Version

IN THE SUPERIOR COURT OF THE STATE OF ARIZONA IN AND FOR THE COUNTY OF MARICOPA

STATE OF ARIZONA, <i>ex rel.</i> MARK) BRNOVICH, Attorney General,	No. CV2020-006219
Plaintiff,	Assigned to the Hon. Timothy Thomason
v.)	(COMPLEX CALENDAR)
GOOGLE LLC, A Delaware Limited Liability) Company,	
Defendant.)	

Expert Report of Seth Nielson, Ph.D.

May 4, 2022

HIGHLY CONFIDENTIAL – ATTORNEYS' EYES ONLY PURSUANT TO PROTECTIVE ORDER

Seth Nielson, Ph.D.

Nielson Technical Report HIGHLY CONFIDENTIAL – ATTORNEYS EYES ONLY, PURSUANT TO PROTECTIVE ORDER

the users' location. Even after implementation of phase 3 of Off Means Coarse, there was nothing a user could do to prevent Google from do so at the 3km² level.

Similarly, despite the various settings, there is nothing a user can do to prevent Google from using location information collected from IP address location for purposes of serving ads. (5/21/2020 Hennessy EUO Tr. at 103:5–23). Despite any other setting, Google collects, saves, and uses the user's location data from IP address. (5/8/2020 Rothfuss EUO Tr. at 271:23–272:1; 2/28/2020 Berlin EUO Tr. at 517:15–23; 5/21/2020 Hennessy EUO Tr. at 103:5–7).

I understand Google's witnesses have also pointed out that Google may need to use an IP address for purposes of fulfilling certain legal obligations that are location based (*e.g.*, based on country) or filtering out spam and fraud. Be that as it may, Google's use of IP addresses does not stop there. Once Google fulfills these legal obligations, I am unaware of any legal or technical reasons as to why Google must use that information for purposes of its advertising business.

In addition to the use of the static IPGeo service, Google also uses what it calls
which is a separate service within Google that attempts to calculate location for users
. Like static IPGeo, Google's IPGeo attempts to calculate
a location for those users who have not enabled (and in fact have disabled) the collection of their location
information through the various settings.
There appear to be at least three differences between static IPGeo and IPGeo.
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Ingemar Eriksson EUO Tr. 242:13
244:23.