

## ***Algorithm-Driven Disability Discrimination***

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This Article operates at the intersection of privacy law and rampant prescription-drug surveillance instigated by the United States drug-overdose crisis. American policymakers frequently frame that ongoing crisis as a *prescription-drug-overdose* “epidemic.” Current epidemiological data, however, indicate that the majority of American overdose deaths are now a result of *illicit and polysubstance drug use* and not prescription-opioid misuse. The prescription-opioid-centric frame has nonetheless sparked the rapid rise of surveillance of prescribers and patients in the form of state prescription-drug monitoring program (“PDMP”) databases. State PDMPs, which maintain and analyze significant data concerning every dispensed controlled substance, surreptitiously collect a stunning amount of sensitive health information.

PDMPs are predominantly law enforcement investigative tools dressed up in public-health-promoting rhetoric. Under the guise of rogue prescriber, pill mill, and doctor–shopper crackdowns, the Drug Enforcement Administration (“DEA”) routinely self-issues subpoenas that permit the agency to conduct warrantless sweeps of the voluminous data stored in state PDMP databases. These rampant law enforcement sweeps procure highly sensitive health information and raise serious constitutional privacy concerns. In a recently-published article, *Prescription Drug Policing: The Right to Health Information Privacy Pre- and Post-Carpenter*, 69 DUKE L.J. 775 (2020), I argue that the Supreme Court’s Fourth Amendment decision in *Carpenter v. United States* may limit the DEA’s otherwise unfettered access to state PDMP data by requiring the DEA to procure a warrant in order to collecting patient prescribing data. Cases currently pending New Hampshire and Colorado, each of which has denied the DEA access to troves of patient PDMP data on similar grounds to those articulated in *Prescription Drug Policing*, promise to put the contentions raised in that article to the test.

This second article in the series is provoked by recent PDMP developments that further threaten patient privacy, generally, and access to necessary health care services and treatments for vulnerable populations, more specifically. While it remains to be seen which side of the line the Court will deem appropriate for patient prescribing information collected by state PDMP databases, the growing sophistication of PDMP software supports imposing a warrant requirement. PDMPs are no longer simply passive databases that store voluminous amounts of sensitive and potentially stigmatizing patient health care data. Instead, they are “smart” databases that rely on robust data-analytics software.

The software that is driving the PDMP smart evolution goes by the moniker NarxCare and is produced by the data analytics company Appriss. “NarxCare” uses black-box algorithms that mine through a patient’s PDMP information to produce multiple three-digit “risk scores,” including a composite overdose-risk score, collectively called “Narx Scores.” Appriss also has

publicly stated that it is working to gather pertinent information from patient electronic health records, including emergency-room records, court records, and other sources in order to improve and hone the precision of its predictive Narx Score algorithms. In fact, at least three states already incorporate patients' criminal histories into their PDMP databases. PDMPs, therefore, are constantly evolving by collecting more and more sensitive data from an expansive number of sources and adopting smarter and smarter trade-secret-protected software, data-analytics tools, and algorithms. As a result, even assuming PDMPs are not yet sophisticated and pervasive enough to satisfy *Carpenter* today, they are swiftly—and inevitably—moving in that direction. This is particularly important given that, as this paper explains, the Narx Score algorithms produce higher risks score by design for certain vulnerable patient populations, including rural patients and individuals with severe and co-morbid conditions. They, thereby, discriminate against those patients by creating unnecessary barriers and obstacles to health care treatment and services.