

Trends in triptan, CGRP monoclonal antibody and gepant prescription rates in a large healthcare system in Boston, MA, USA from 2018-2024

Patrick Ebbert, MD¹, Pamela Rist, ScD^{2,3}, Elizabeth Loder, MD, MPH¹, Angeliki Vgontzas, MD¹

¹Department of Neurology, Brigham and Women's Hospital, Harvard Medical School, Boston, MA, USA; ²Division of Preventive Medicine, Department of Medicine, Brigham and Women's Hospital, Harvard Medical School; ³Department of Epidemiology, Harvard T.H.Chan School of Public Health, Boston, MA, USA

OBJECTIVE

- To describe triptan and CGRP inhibitor prescription rates by patient demographics in the Mass General Brigham Health System from 2018-2024

METHODS

- Electronic health record data from the Mass General Brigham Research Data Registry (RPDR)
- Patients ≥ 18 years with a migraine diagnosis (ICD-10 G43) and prescribed a triptan or CGRP inhibitor May 1, 2018 - November 1, 2024
- We describe annual prescription data by patient demographics
- Categorical data compared using chi square with Yates correction. A p-value less than 0.01 was considered statistically significant.

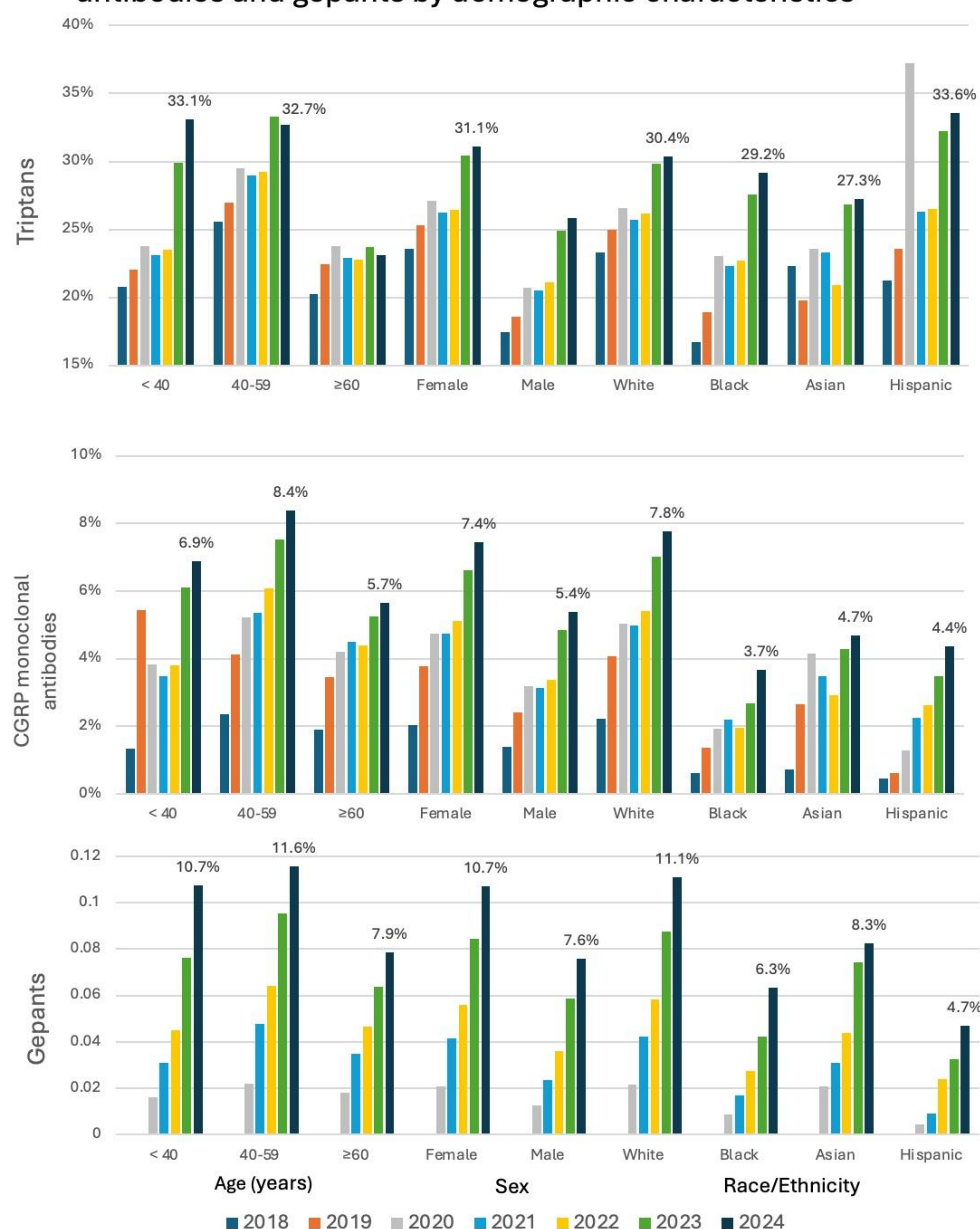
Co-prescriptions of triptan and CGRP-inhibitors

		Only Triptan N = 35,558	Only CGRP* N = 4740	Tried CGRP and Triptans Separately* N = 5265	CGRP + Triptan at same time* N = 3635
Age, n (%)	Under 40	13066 (36.7)	1420 (30.0)	1458 (27.7)	1239 (34.1)
	40-59	14373 (40.4)	1930 (40.7)	2348 (44.6)	1688 (46.4)
	60+	7734 (21.8)	1351 (28.5)	1124 (21.3)	683 (18.8)
Sex, n (%)	Female	30135 (84.7)	4029 (85.0)	4676 (88.8)	3235 (89.0)
	Male	5418 (15.2)	709 (15.0)	596 (11.3)	395 (10.9)
	White	27673 (77.8)	4126 (87.0)	4527 (86.0)	3160 (86.9)
Race/ Ethnicity, n (%)	Black	2265 (2.8)	136 (2.1)	187 (2.2)	121 (2.1)
	Asian	989 (2.8)	99 (2.1)	115 (2.2)	77 (2.1)
	Other	4631 (13.0)	379 (8.0)	438 (8.3)	275 (7.6)
	Hispanic	1783 (5.0)	63 (1.3)	130 (2.5)	85 (2.3)
Migraine diagnosis, n (%)	Chronic M	6530 (18.4)	2091 (44.1)	2874 (54.6)	2324 (63.9)
	Aura	10531 (29.6)	1589 (33.5)	2059 (39.1)	1305 (35.9)

*Age, Sex, Race/Ethnicity and migraine diagnoses differed when compared to the "only triptan" group ($p < 0.001$) except when comparing sex between the only CGRP group and only triptan group ($p = 0.63$)

RESULTS

Annual prescription rates of triptans, CGRP monoclonal antibodies and gepants by demographic characteristics



- 147,153 patients with migraine, 41.2% prescribed a triptan, CGRP mAb or gepant
- Prescription rates higher in 2024 than in 2018 for triptans (30.3% vs 22.5%), CGRP mAbs (7.1% vs 2.0%) and gepants (10.2% vs 1.9%) [year 2020], $p < 0.001$ for all

CONCLUSIONS

- Overall, there was an increase in the prescription rates for triptans, gepants and CGRP mABs in each demographic group from 2018-2024, although disparities were noted.