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# Stroke Research of Taipei Medical University

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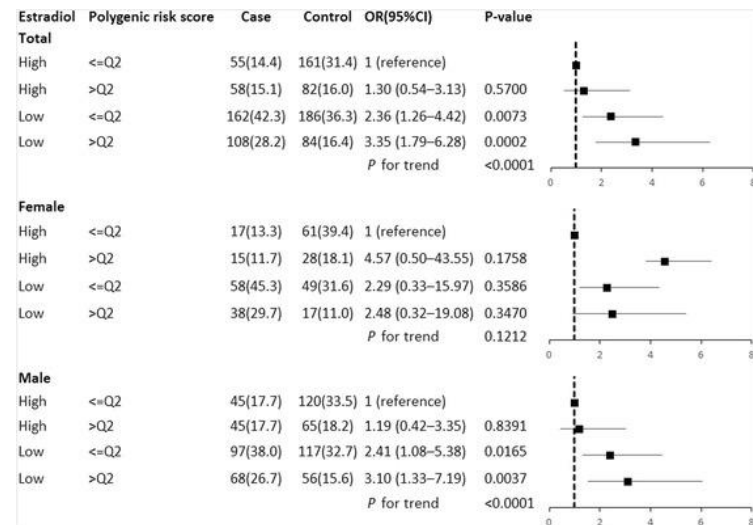
臺北醫學大學  
TAIPEI MEDICAL UNIVERSITY

# Stroke Researches (1)

- 2003 Stroke Research Center
- 2006 Taiwan Stroke Registry (TSR, over 150,000 patients)
- 2010 Formosa Stroke Genetic Consortium (FSGC, over 3000 gDNA)
- 2012 Stroke Biosignature/Taiwan biobank (fMRI, lncRNA, multi-omics)
- 2013 Cerebrovascular Research Center (venous system/autoregulation)
- 2017 Taiwan Clinical Trial Consortium-stroke (TCTCS)

Table 1. Distribution of Stroke Types and Subtypes

Type	n	%
Ischemic stroke*	22 642	74.0
Large artery atherosclerosis	6270	27.7
Small vessel occlusion	8541	37.7
Cardioembolism	2465	10.9
Specific pathogenesis	332	1.5
Undetermined pathogenesis	5034	22.2
TIA	2053	6.7
ICH	4913	16.1
SAH	846	2.8
Cerebral venous thrombosis	46	0.2
Other	99	0.3
Total	30 599	100.0



Circulation. 2010;122(11):1116-23

Combined effect of estradiol levels and polygenic risk score on the risk of ischemic stroke. (FSGC), *J Biomed Sci.* 2012;3;19:1, 2017; 24: 25. *PLoS One.* 2012;7(10):e47773.

# Stroke Researches (2)

## Cerebral venous disorders in Neurological diseases

Transient global amnesia

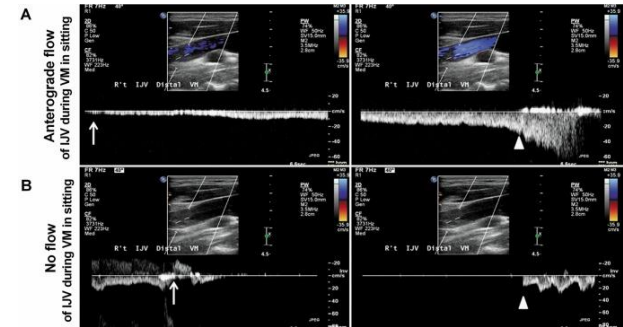
Transient monocular blindness

Exertion headache, cough headache, syncope

Migraine

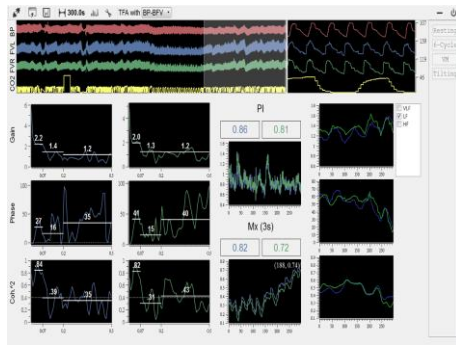
Panic disorder

Age related white matter disease



Cephalalgia. 2004;24(11):973-9. Neurology. 2006;66(12):1873-7, Stroke. 2007;38(4):1377-9. Ann Neurol. 2008;63(2):247-53. J Psychiatr Res. 2014:155-60. J Alzheimers Dis. 2014;39(3):601-9.

## Cerebral auto-regulation in Neurological diseases



### All-in-one and real-time analysis

1. Cerebral Autoregulation
2. Vasomotor Reactivity (CO<sub>2</sub> Reactivity)
3. Neurovascular Coupling (Functional Hyperemia)

Ultrasound in Medicine and Biology. 2017;43, 7:1307-13, Schizophr Res. 2017t; 188:63-67.