Cerebrolysin-mediated functional and neurological outcomes in patients with diabetes and moderate acute ischemic stroke: a C-REGS2 subgroup analysis

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BACKGROUND

- Diabetes mellitus (DM) affects about one in four patients with ischemic stroke (IS).
- DM is associated with recurrent stroke (pHR 1.42) and death (pHR 1.56) after IS [2].
- In C-REGS2, Cerebrolysin was associated with better 90-day functional outcome [1].

AIM

To test whether patients with DM also benefited from Cerebrolysin treatment after moderate acute ischemic stroke.

REFERENCES

C-REGS2 main results [1]
ISRCTN98553245
NCT03480698

[1] Vosko et al. Int J Stroke 2025;20:1060
[2] Kaynak et al. Cardiovasc Diabetol 2024;23

METHODS

Prospective, open-label, controlled comparative effectiveness study; 16 countries; 1,865 enrolled.

Target population n = 1,769
NIHSS 8–15 · no prior stroke · pre-stroke mRS ≤1

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Diabetes subgroup, analyzed at day 90

Endpoints: ordinal mRS and NIHSS at day 90. Mann-Whitney (MW) effect size with multilevel case-mix standardization.

RESULTS (diabetic subgroup)

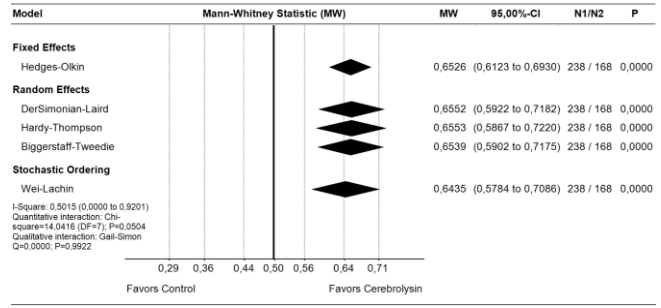
Cerebrolysin n=238	Control n=168/167*

mRS DAY 90
MW 0.6435
95% CI 0.5784-0.7086
P<0.0001

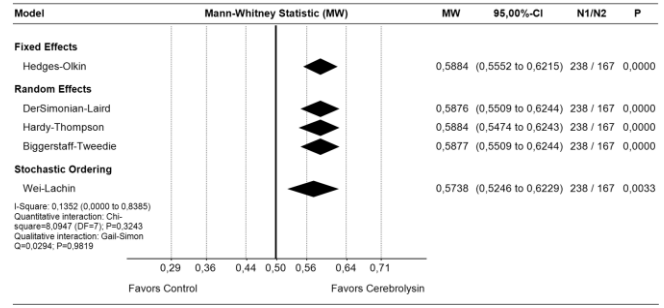
NIHSS DAY 90
MW 0.5738
95% CI 0.5246-0.6229
P=0.0033

*NIHSS control n=167.

ADJUSTED DAY-90 OUTCOMES



A Functional outcome: modified Rankin Scale



B Neurological outcome: NIH Stroke Scale

CONCLUSIONS

In patients with DM and moderate acute IS, Cerebrolysin was associated with **better functional and neurological outcome** at day 90 than standard therapy alone.

Effect sizes were of similar magnitude to those in the full target population.

Reference: Abstracts from the 18th World Stroke Congress, 21-23 October 2026, Seoul, Korea. International Journal of Stroke. 2026;21(2_suppl):3-412. doi:10.1177/17474930261484004, page 21, ID1162