Stroke Prevention in Symptomatic Intracranial Atherosclerosis

Diagnosis, antithrombotic therapy, vascular risk factor modification, and endovascular/surgical options for symptomatic large artery intracranial atherosclerosis (sICAS).

2022 AAN Practice Advisory
Stroke Prevention in Symptomatic Large Artery Intracranial Atherosclerosis
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LEVEL · A · Must (Highest Confidence) · B · Should (Moderate) · C · May (Lower Confidence)

1 Diagnosis

B	**Workup:** use diagnostic modalities to diagnose sICAS and distinguish it from other intracranial vasculopathies when results would change management or add prognostic value.

2 Antithrombotic Therapy

B	**Aspirin** 325 mg/day, preferred over warfarin, for long-term stroke/death prevention.
B	**Dual therapy:** add clopidogrel 75 mg/day to aspirin for up to 90 days in severe (70%–99%) sICAS with low hemorrhage risk.
C	**Alternative:** may add cilostazol 200 mg/day instead of clopidogrel, or in Asian patients, with low hemorrhage risk.

3 Vascular Risk Factor Modification

B	**Statin:** high-intensity therapy to achieve goal LDL < 70 mg/dL.
B	**Blood pressure:** long-term target < 140/90 mm Hg in clinically stable patients.
B	**Physical activity:** at least moderate activity in patients safely capable of exercise.
A	**Other risk factors:** must treat other modifiable vascular risk factors.

4 Investigational — Ischemic Preconditioning

–	**BAIPC:** no consensus reached; evidence limited to 2 small, unblinded Chinese trials — insufficient to recommend for or against.

5 Endovascular Therapy — PTAS

B	**Severe sICAS:** should not recommend PTAS as initial treatment for 70%–99% stenosis.
B	**Moderate sICAS:** should not recommend PTAS for 50%–69% stenosis.
B	**Angioplasty alone:** should not routinely recommend outside clinical trials.
B	**Counsel:** discuss PTAS risks and alternative treatments if a procedure is being contemplated.

6 Surgical Therapy

B	**Direct bypass:** should not recommend for stroke prevention in sICAS.
A	**Indirect revascularization:** must not routinely recommend outside clinical trials.

Turan TN, Zaidat OO, Gronseth GS, et al. Stroke Prevention in Symptomatic Large Artery Intracranial Atherosclerosis Practice Advisory: Report of the AAN Guideline Subcommittee. *Neurology.* 2022;98(12):486-498.