

ABSTRACT

Background: Current guidelines advice intervention on non-symptomatic carotid stenosis from 70% up to 99% in selected cases. literature divides stenosis over 99% into two types; near occlusion with a collapse and one without. There are data suggesting that eventual intervention on sub-occlusion might have different outcome depending on its type but not only degree.

Methods: n years 2017/2018 16 consecutive patients in total with a non-symptomatic sub-occlusion without a collapse fitting into endovascular intervention criteria according to current guidelines were included into the study. Control group consist of 20 consecutive patients with asymptomatic critical stenosis (from 70 up to 99%) also fitting actual criteria for invasive treatment by endovascular means. In all cases a neuroprotection was used. All patients were reviewed one year after the procedure with carotid duplex ultrasound, and angio-CT performed.

Results: There were no neurological nor endovascular periprocedural complications in booth groups. All stents were patent one year after the procedure. In four cases in sub-occlusion group there was non-significant restenosis observed – up to 30% radiologically (NASCET criteria). None in control group was noted. In doppler ultrasound mean resistive index (RI) was 0.69, SD 0.03 in internal carotid artery in sub-occlusion group, whereas in control group 0.71, SD 0.05, $P > .005$. We noted significant elongation of Acceleration Time (ACT) in sub-occlusion group in internal carotid artery which was 0.1 s, SD 0.04, whereas in control group was 0.68 s SD 0.09 $p < .005$.

Conclusions: Endovascular intervention on carotid sub-occlusion without a collapse seems to be safe and effective treatment in early observations. Considering number of noted non-significant restenosis in this group (in 4 out of 16 cases) and slightly but statistically significant extended ACT, there is a possibility of later significant restenosis and longer observations to exclude one would be needed.

BACKGROUND

Current guidelines advice intervention on non-symptomatic carotid stenosis from 70% up to 99% in selected cases. literature divides stenosis over 99% into two types; near occlusion with a collapse and one without. There are data suggesting that eventual intervention on sub-occlusion might have different outcome depending on its type but not only degree.

PURPOSE

To find among patients with subocclusions those who my benefit from intervention

METHODS

In years 2017/2018 16 consecutive patients in total with a non-symptomatic sub-occlusion without a collapse fitting into endovascular intervention criteria according to current guidelines were included into the study. Control group consist of 20 consecutive patients with asymptomatic critical stenosis (from 70 up to 99%) also fitting actual criteria for invasive treatment by endovascular means. In all cases a neuroprotection was used. All patients were reviewed one year after the procedure with carotid duplex ultrasound, and angio-CT performed.

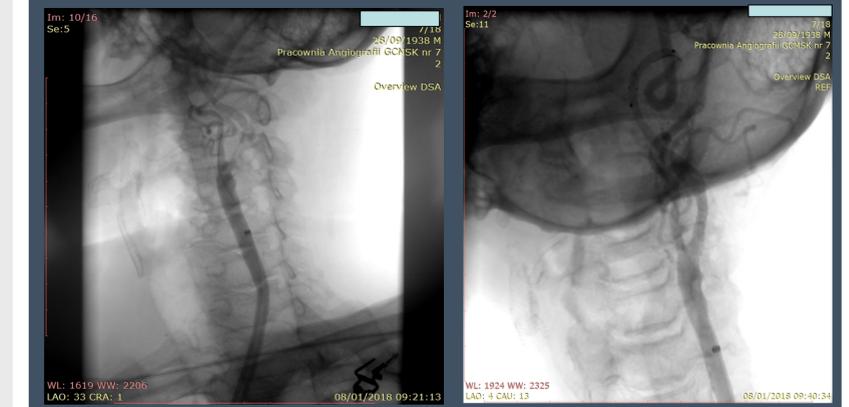
RESULTS

There were no neurological nor endovascular periprocedural complications in booth groups. All stents were patent one year after the procedure. In four cases in sub-occlusion group there was non-significant restenosis observed – up to 30% radiologically (NASCET criteria). None in control group was noted. In doppler ultrasound mean resistive index (RI) was 0.69, SD 0.03 in internal carotid artery in sub-occlusion group, whereas in control group 0.71, SD 0.05, $P > .005$. We noted significant elongation of Acceleration Time (ACT) in sub-occlusion group in internal carotid artery which was 0.1 s, SD 0.04, whereas in control group was 0.68 s SD 0.09 $p < .005$.

AGE AVERAGE	71
SEX	F-5 M-15
SMOKER	14
PREDILATATION	20
STENT TYPE	Precise 7 Wallstent 12 MER 1

CONCLUSION

Endovascular intervention on carotid sub-occlusion without a collapse seems to be safe and effective treatment in early observations. Considering number of noted non-significant restenosis in this group (in 4 out of 16 cases) and slightly but statistically significant extended ACT, there is a possibility of later significant restenosis and longer observations to exclude one would be needed



DISCLOSURES

None