



## SURGICAL TREATMENT OF GREAT SAPHENOUS VEIN'S MULTIPLE ANEURYSMS CAUSING SAPHENOFEMORAL INSUFFICIENCY

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### ABSTRACT

Great saphenous vein's aneurysms are rare clinical entities and especially that can diagnosis as an inguinal hernia in physical examination. Detailed anamnesis, physical examination and detailed doppler ultrasonography are very important in the femoral region masses. We present a case, who was operated for venous insufficiency but we observed multiple great saphenous vein aneurysms in the operation.

**Key words:** Venous Aneurysm, Saphenous Vein Insufficiency.

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### INTRODUCTION

Venous aneurysms were defined as enlargement with a measurement exceeding 1.5 times of normal size or more than the adjacent venous segment [1]. Venous aneurysms are generally asymptomatic. The superficial mass lesion associated with the venous aneurysm may be confused with inguinal or femoral hernias. We present a 51 years-old man with great saphenous vein's multiple aneurysms who was treated surgical excision.

### Case Report

51-year-old male patient presented to our clinic with pain and swelling in his right leg. Diffuse varicose veins were observed and there was not a

palpable mass in his right leg. Duplex ultrasonography showed severe right great saphenofemoral junction insufficiency. Deep venous system was completely normal. There were no pathological findings on laboratory datas. Under the spinal anesthesia, just about 3-4 cm right groin incision was performed and saphenofemoral junction was found in the operation. An aneurysmal dilatation was observed in right-saphenofemoral junction.

After the saphenofemoral ligation, aneurismatic great saphenous vein was removed by a stripper. After the saphenous vein excision, another aneurismatic dilatation was observed in the popliteal region (Figure 1). After the bleeding control, incisions were sutured with 5.0 prolene. The patient was discharged completely healthy two days later after his operation.

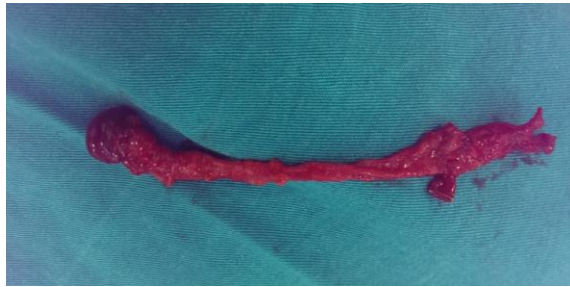
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**Figure 1. Great Saphenous Vein Aneurysm Is Seen With Thrombus**



## DISCUSSION

Primary aneurysm of the saphenous vein is a rare clinical entity. Morphologically, primary venous aneurysms are divided into two subgroups as saccular and fusiform. Pascarella et al. classified aneurysm of the saphenous system into four types according to its localization [1]. According to this classification our case had a type III great saphenous aneurysm. The etiology of venous aneurysms is not known clearly. Klippel-Trenaunay syndrome or Servelle-Martorell syndrome may be associated with venous aneurysm. Diagnosis is readily available by duplex ultrasonography; however, in most cases, the diagnosis is done only in the operative field. Most venous aneurysm are diagnosed only in the operative field, although they are located in the superficial venous system, are palpable and easily compressed [2]. In earlier reports, venography was suggested as the imaging technique of choice. There are several reasons to recommend surgical treatment of most venous aneurysms.

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The most common complications of venous aneurysms are thrombus formation, severe recurrent pulmonary embolism, spontaneous rupture, and thrombophlebitis, but all of them are quite rare. In our case, we operated the patient for venous insufficiency. Venous aneurysms may be confused with inguinal or femoral hernias [3]. Simsek et al. and Cicek et al. reported two case with diagnosed great saphenous vein aneurysm [4,5].

In this two cases were diagnosed as an inguinal hernia at first step. Detailed cardiovascular examination and Doppler ultrasonography were supported the venous aneurysm diagnosis in same cases. Many surgical methods can use in venous aneurysm treatment such as ligation, simple excision, excision and patch with autologous vein or complete resection. Cicek et al performed surgical excision to aneurysmal segment and repair to superficial venous system and Simsek et al. performed surgical resection and end-to-end anastomosis to the venous aneurysm. We performed only complete resection because of venous insufficiency.

## CONCLUSIONS

The saphenofemoral venous aneurysms can be primary cause of venous insufficiency. In these cases, open surgery is a smart choice instead of closed surgery for the eliminate of venous insufficiency.

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## CONFLICT OF INTEREST:

The authors declare that they have no conflict of interest.



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