# Myxoid cyst: A Case Report of rare skin disease

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#### Abstract

Digital myxoid cyst is a benign skin disease usually present as solitary or a few soft, translucent to slightly bluish nodule. Here, we report a case of 20 years old lady presented with a slowly growing asymptomatic cystic lesion on her right ring finger for about 9 months considering the rarity of myxoid cyst.

#### Introduction

Digital myxoid cyst usually present as solitary or a few soft, translucent to slightly bluish nodules. The thumb, index finger and middle finger are the most frequently affected sites. It occurs most commonly on the dorsal or lateral terminal digits of hands but rarely may also occur on the toes. When involving the nail matrix, they can cause cosmetic problems, pain, and nail dystrophy. They present as solitary, 5-7 mm, opalescent or skin coloured cysts, occur as asymptomatic swellings of the proximal nailfold, as subungual growths, or over distal interphalangeal joint. Women are more likely affected and osteoarthritis is frequently present in adjacent distal interphalangeal joint. When a myxoid cyst is present beneath the proximal nail fold, a characteristic groove may be formed in the nail plate by pressure of the lesion on nail matrix. Diagnosis can be confirmed by magnatic resonance imaging or surgical exploration. They contain a clear viscous, sticky fluid that may spontaneously drain. This cyst do not have epithelial lining but have compact fibrous wall. Treatment depends on the site of the cyst. Repeated puncture techique, steroid may be injected into the tissue after draining the cyst, destruction by cryotherapy, co. laser ablation, curettage are the modalities of treatment. Surgical excision may cure in 90% of cases<sup>1</sup>.

## Case report

A 20 years old lady presented with a slowly growing asymptomatic cystic lesion on her right ring finger for about 9 months. Her medical and family history were non contributory. Although the patient had no history of accidental injury, further inquiry revealed that he had frequent pricking habits since the first appearance of the lesion.

Physical examination revealed a cystic lesion measuring about 5sq mm on dorsum of right ring finger involving proximal nailfold. Cyst is firm and nontender. There is a longitudinal groove on involved nailplate, is a characteristic feature of myxoid cyst. The pricking of the lesion caused drainage of clear

and gelatinous materials.

X-ray and MRI of the affected finger revealed no features of osteopathic changes, only the growth of soft tissue, without any abnormalities in the bony structure. Other investigation revealed no abnormalities.



**Figure-1:** Showing a cystic lesion on dorsum of rt ring finger involving proximal nailfold.



**Figure-2**: Showing longitudinal groove due to myxoid cyst present on proximal nail fold.

## **Discussion**

The exact etiology of myxoid cyst is not fully elucidated. Some studies indicate it being a process of degeneration<sup>2</sup>. Osteoarthritis may play a role because many patients with digital myxoid cysts were also found to have osteoarthritis of the nearby joints<sup>3</sup>. Inflammation of the joint causing weakening of the surrounding soft tissue in combination with the increase of the joint fluid could make extrusion of the joint fluid easier. However, this patient did not have any symptoms related to arthritis such as arthralgia or swelling of the joints. On the other hand, digital myxoid cysts may be related to increase intraarticular pressure of the joints. Two occupation-related cases have been reported. One was a cashier whose work

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Md. Mahabubur Rahaman MBBS, FCPS (Dermatology & VD) DDV Assistant Professor Central Medical College, Comilla required repeated bending and straightening of her fingers<sup>4</sup> and the other was a factory worker whose work was pushing a garment into a mold.<sup>3</sup>

The treatment options for digital myxoid cyst include incision and drainage, intralesional steroid injection, cryotherapy, carbon dioxide laser, electrocoagulation and several means of surgical treatment<sup>5,2,6</sup>. But the recurrence rate is high, even in the situation of excision.<sup>7</sup> Ligation of digital myxoid cysts in the origin at the joint capsule with the assistance of dye injection produces a satisfactory result<sup>2</sup>. Utilizing bilobed rotational flap also yields high success rate.<sup>7</sup>

However, in our case the patient is advised to followed up at a regular interval without doing any surgical intervention as it is asymptomatic and has a chance to disappeared spontaneously.

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