

Aqueous Chemosis: Rare Complication in Nephrotic Syndrome in Adults

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Abstract:- A 42-year patient with nephrotic syndrome was presented because of bilateral chemosis. The diagnosis was based on physical examination , In the biological assessment, there is a hypo albuminemia, nephrotic proteinuria , and an active urinary sediment, with renal function was preserved. The anatomopathological study of kidney biopsy puncture (KBP) objectified: extra capillary glomerulonephritis . The course was marked by the regression of the aqueous chemosis after the treatment of glomerulonephritis .

Keywords:- Chemosis; Nephrotic Syndrome, Extracapillary Glomerulonephritis .

I. INTRODUCTION

Aqueous chemosis or white chemosis is a rare and reversible complication of nephrotic syndrome. We report the case of a 42-year-old patient presenting with nephrotic syndrome and in whom the ophthalmologic examination found bilateral aqueous chemosis falling within the anasarchus picture in which the patient presented.

II. CASE REPORT

A 42-year-old patient, with no pathological history, was presented to the emergency room in a state of anasarca associating a bilateral aqueous chemosis more marked on the left.

General clinical examination found edema of the lower limbs, pleural effusion syndrome, with high blood pressure.

In the biological assessment, there is a hypoproteinemia at 35g / l, deep hypo albuminemia at: 17g / l, nephrotic proteinuria: 15g / 24h and an active urinary sediment, with renal function was preserved, as well as the C3, C4 fraction of the complement which was normal, the immunological workup was negative.

Biomicroscopic ophthalmologic examination revealed the presence of bilateral aqueous chemosis (Fig:1), non-inflammatory, more pronounced in the left eye, The anterior segment was calm, and the fundus recovered papillae with sharp contours of normal staining, physiological excavation, and the macula was unremarkable in ODG.

The anatomopathological study of KBP objectified: extra capillary glomerulonephritis with endocapillary lesions with linear deposits of IgG and C3.

The diagnosis of extra capillary glomerulonephritis was retained, and led to the administration of a bolus of methylprednisolone, followed by 6 boluses of cyclophosphamide, a diuretic treatment and an anti-thrombotic treatment, with good progress. clinico-biological and in particular a regression of bilateral chemosis.

III. DISCUSSION

Chemosis is a rare and unusual complication of nephrotic syndrome. [1]

A similar case has been reported in the literature in a 15-year-old child with severe nephrotic syndrome [2].

Aqueous chemosis, or conjunctival edema, may be inflammatory or non-inflammatory. Non-inflammatory chemosis is most often secondary to an allergic reaction.

Frequently asymptomatic, as is the case with our patient. However, it can manifest as irritation, tearing, pruritus or sometimes even diplopia.

As part of the syndrome, it seems that chemosis is secondary to fluid retention secondary to hypoproteinemia. No local treatment would be indicated and the regression of chemosis would be done in parallel with the regression of the generalized edematous syndrome [1].

IV. CONCLUSION

Aqueous chemosis in nephrotic syndrome is a rare but benign complication. It would be secondary to the fluid retention due to hypoproteinemia, and no local treatment is indicated, the regression of chemosis would be concomitant with the disappearance of the clinical-biological nephrotic syndrome.



Fig 1 : aqueous chemosis on admission

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