

Celiac Disease & Lymphoproliferative Malignancy at Adulthood

Hakim Rahmoune^{1,2,*}, Nada Boutrid^{1,2}, Mounira Amrane^{2,3}, Soraya Ouhida^{2,4},
Djamel Abdellouche⁴, Belkacem Bioud^{1,2}

¹Department of Pediatrics, University Hospital of Setif, Setif 1 University, Algeria

²Genetic, Cardiovascular & Nutritional Diseases Laboratory, Setif-1 University, Algeria

³Laboratory, CAC-Setif, Setif 1 University, Algeria

⁴Department of Pathological Anatomy, University Hospital of Setif, Setif 1 University, Algeria

*Corresponding author: rahmounehakim@gmail.com

Abstract Celiac disease (CD) is associated with an increased risk for malignancy, specially lymphoproliferative. During a retrospective annual study of intestinal biopsies results in the pathology department at the University Hospital of Setif, we were only half surprised to find a lymphoma in an adult patient initially presenting a CD. We briefly present this case with a review of the current literature.

Keywords: celiac disease, lymphoproliferative malignancy, gastrointestinal cancers

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1. Introduction

Celiac disease (CD) is an auto-immune disease triggered by dietary exposure to gluten in genetically susceptible population (carrying HLA-DQ2 Or HLA-DQ8) [1].

CD in adulthood depicts a higher frequency extra intestinal manifestations as well as many associations with other immune mediated diseases and malignancies. Particularly, CD is associated with an increased risk for lymphoproliferative malignancy, while other types of malignancies are sparsely reported [2,3].

2. Material and Method

We made a retrospective study of the reports of intestinal biopsies in celiac patients in the University Hospital of Setif.

Thus, a group of interns in medicine collected the histological reports of these biopsies at the department of pathology during the year 2016 (from January 1st to December 31st, 2016).

We analyzed various data including the different associated lesions in celiac population.

3. Results

We collected fifty nine (59) reports of both adult and pediatric celiac patients (32 adults and 17 children).

We found one patient (1.7% of the total reports) that associated celiac disease and intestinal (small bowel) lymphoma.

Further information about this case (a female patient, 41 years old) could not be obtained (anonymous data).

4. Discussion

Evidence, including population-based studies, confirmed that patients with diagnosed CD are at increased risk of malignancy and mortality [4,5].

Notably, patients with CD have an increased risk of lympho-proliferative malignancy and gastrointestinal cancer; and enteropathy-associated T cell lymphoma may occur in a subgroup of patients with refractory CD [6,7].

Inversely, reduced IgA and IgG levels lead to a lower detection rate of serological screening for CD in patients with a history of lymphoma [8].

A recent meta-analysis found that CD was particularly associated with an overall increased risk of gastro-intestinal malignancies like esophageal cancer and small intestinal carcinoma [9].

Persistent villous atrophy during CD compared with mucosal healing was associated with an increased risk for lymphoproliferative neoplasms [10].

In such cases of complicated CD, enteroscopy (wireless or wired) is considered as an efficient diagnostic tool for the detection of malignant and premalignant lesions of the small bowel [11,12].

At the opposite, some evidence suggests that a gluten free diet could reduce the risk of lymphoproliferative malignancy, and even reduces the overall risk of mortality [4].

As mentioned before, in addition to digestive neoplasms, CD patients present also a higher risk to develop other malignancies like [13,14,15].

5. Conclusion

Celiac disease prevalence is increasing worldwide, and awareness about its complications should also increase.

Malignancies are a well-recognized risk in celiac adults ; and this potential risk is affected by precocious diagnosis and correct management (including the cornerstone gluten free diet).

Counseling and recognizing such at-risk patients would be a valuable, highly effective predictive medicine.

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