Reviewer’s report

Title: Treatment outcome of patients with comorbid type 1 diabetes and eating disorders

Version: 1 Date: 12 March 2014

Reviewer: Francesco Rotella

Reviewer’s report:

The authors performed a study aimed at comparing clinical, psychopathological and personality features in Eating Disorders (EDs) patients with and without comorbid type 1 diabetes mellitus (T1DM). Furthermore, authors performed an intervention of 16 sessions of cognitive-behavioral therapy (CBT) in order to evaluate differences in treatment outcome between the two groups. The topic is of great interest. However, there are some methodological issues that significantly impair the quality of the results. Furthermore, given the very low prevalence of EDs in comorbidity with type 1 diabetes, from an initial sample of 1887 patients with EDs, only 20 patients were included in the study. Therefore, the sample size is very limited and the data reported are almost anecdotal.

Major compulsory revisions

Introduction:
1. The introduction appears very narrow and do not place the reader in the adequate perspective. For example, some meta-analyses have been published taking into account the association between EDs and type 1 diabetes. This association can be explained in several different ways and varies in different EDs diagnostic groups.

2. AN, BN and BED have been associated to different temperamental profiles (e.g. Krug I, Root T, Bulik C, Granero R, Penelo E, Jiménez-Murcia S, et al. Redefining phenotypes in eating disorders based on personality: A latent profile analysis. Psychiatry Res 2011;188:439–445). For example, the temperamental feature “Persistence” seems associated only to AN Restricting type. This information should be given and discussed.

Methods, Participants:

3. Some relevant information on patients with diabetes is missing. At least duration of illness and glycemic control should have been assessed.

4. The fact that the samples are composed of patients with different EDs psychopathology (i.e. AN, BN, BED and EDNOS), can have significantly affected the results.

Results:

5. Almost all T1DM patients used insulin manipulation to control weight. This data should be discussed, especially when reporting that no difference was found.
between groups for compensatory behaviors.

Results, Treatment outcome:

6. The distribution of dropout rates for T1DM patients reported in the text is not clear. Numbers of patients and the distribution for patients without T1DM should be included. Furthermore, this distribution seems slightly different from what shown in Figure 1.

Discussion:

7. The Discussion is also narrow. The fact that T1DM patients display lower “Perceived intensity of ED” and lower “Impairment” scores may explain higher dropout rates. It may be hypothesized that T1DM do not recognize the need for a treatment for the ED.

Minor essential revisions

Abstract:

1. The conclusions are in line with the results reported by authors.

Methods, Participants:

2. The 55% of the patient have a diagnosis of EDNOS. The subtype (A or B) should be addressed as the two different subgroups display different psychopathological features.

Figure 1:

3. “Time” variable is not clear. It should refer to the number of CBT session, but, if this is the case it is not clear why values >16 are included in the figure.

Level of interest: An article of limited interest

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

I declare that I have no competing interests