Dear Editors,

We are re-submitting the revised manuscript, “Improved diagnostic yield of EUS-FNB with histology specimen processing” to *World Journal of Gastrointestinal Endoscopy*. We are immensely grateful for the reviewer’s and editors’ comments, which we found to be constructive and insightful. We have addressed all the comments and incorporated all of the suggestions into our manuscript.

We thank the editors and reviewers for the opportunity to revise our manuscript and for the consideration for publication in *World Journal of Gastrointestinal Endoscopy*.

Sincerely,

Sofiya Reicher, on behalf of the authors

Responses to the comments

Editor's comments:
(1) I found the authors did not provide the approved grant application form(s). Please upload the approved grant application form(s) or funding agency copy of any approval document(s);

- We have attached a letter from the grant Principal Investigator, Dr. Christina Wang. Per Lundquist Research Institute for Biomedical Innovation institutional policy, the grant application forms or approvals could not be publically released, as they contain confidential financial information. The letter attests that the grant supported statistical consultation used for the study; the grant has been cited in the manuscript using the NIH recommended format.

(2) I found the authors did not write the "article highlight" section. Please write the "article highlights" section at the end of the main text; and

- The "article highlight" section was added and is now included in the revised manuscript at the end of the main text.

(3) the authors need to complete the STROBE file.

- The completed STROBE checklist is now included.

Reviewer #1's comments:
In this study, the Authors aimed to evaluate two different techniques for specimens EUS-guided specimens' collection: EUS-FNA cytology and EUS-FNB histology. I have several major points to be addressed before publication:

ABSTRACT:
1) The abstract seems too long (about 500 words). Please carefully consider the Journal guidelines.

- We have revised the abstract so that it meets but is not significantly longer than the minimum of 350 words.

INTRODUCTION:
1) In the introduction, among diseases needing samples with intact architecture to be properly diagnosed, you should cite also pancreatic vascularized lesions which include several different lesions with different management and prognosis (see Crinó SF, et al. Ultraschall Med. 2019;10.1055/a-1014-2766).

- Thank you for this valuable comment. This point and citation have been added to the Introduction and Discussion sections. Unfortunately, at this time contrast-enhanced EUS is not FDA approved in the United States and is not available at our institution.

2) In the introduction, you stated that EUS-FNB could have a lower rate of complication compared with EUS-FNA. This sentence should be mitigated.

- Thank you for this suggestion. We have changed the wording in our manuscript to state that EUS-FNB was reported to have a similar rate of complications to EUS-FNA.

3) At the end of the introduction, the aim of the study should be clarified. You stated: "We evaluate the performance of EUS-FNB with regards to specimen processing as histology rather than cytology". However, in this study, you compared EUS-FNA cytology vs. EUS-FNB histology. Please amend properly.

- Thank you for this important comment. We have amended the wording of the aim of our study. It now states, "We evaluate the performance of EUS-FNB with specimen processing as histology versus EUS-FNA cytology with regards to diagnostic yield and specimen adequacy".

METHODS:
1) Please spell "EHR".

- "EHR" has been spelled out as "Electronic Health Record".

2) The aim of the study, stated in the introduction, was to compare "the performance" of two different sampling techniques. Please clarify what "performance" means (i.e., diagnostic accuracy and rate of sample adequacy). You should also refer to standard definitions (see Wani S, et al. Clin Gastroenterol Hepatol. 2018;16(3):318–327)

- We clarified the aim of the study to specify the techniques' performance characteristics. We included in the Methods section standardized definitions provided by Wani, *et al*.

3) Moreover, I would mention the evaluation of both techniques reported in the result section.

- Thank you for this valuable comment. We have added the description of both techniques in the Methods section with references.

4) Please, state clearly that rapid on-site evaluation was not available.

- We have stated in the Methods section that rapid on-site evaluation is not available at our institution.

5) Clarify the cell-block procedure. As a reference, you could cite Ieni A, et al. Hepatobiliary Pancreat Dis Int. 2015;14(3):305–312

- Thank you for this suggestion. We have added the description of our cell block technique, and added the reference.

RESULTS:
1) Please, change “average” with “mean” and add ranges where appropriate (e.g., near the mean number of needle passes).

- All instances of “average” have been replaced with “mean”. We have added ranges for the number of needle passes for both FNA and FNB techniques.

2) You stated: “In patients who underwent FNA with FNB, there was a statistically significant difference in diagnostic yield (McNemar’s test, P=0.0455) between the FNA and FNB specimen subgroups”. Please add details regarding this subgroup. Which was the diagnostic yield (percentages) of FNA and FNB in the “double technique” subgroup?

- The diagnostic yield of FNA and FNB needles in the“double technique” subgroup have now been included in a separate paragraph under the subheading “Diagnostic yield”.

3) Please, do the same regarding specimen adequacy.

- The specimen adequacy of FNA and FNB needles in the “double technique” subgroup have now been included in a separate paragraph under the subheading “Specimen adequacy”.

4) Please, add to results (or provide a table) how many Acquire, SharkCore, and Procore have been used.

- Thank you was this important suggestion. A new Table 1 with baseline characteristics has been added, and includes the distribution of needle types used.

DISCUSSION:
1) The collection of histological specimens, do not preclude the possibility to perform cytological analysis, including rapid on-site evaluation. Please, discuss this important point (see Crinò SF, Cytopathology. 2019;30(2):179–186) that allows to obtain cytological and histological specimens with the same needle, and during the same procedure.

- This is a valid and insightful comment. We have added this point to the Discussion section of the manuscript and included the citation.

2) Please, compare your results with previous literature where the ProCore or the SharkCore were used (see, for example, Armellini E, et al. United European Gastroenterol J. 2019;7(1):96–104 and Di Leo M, et al. Dig Liver Dis. 2019;51(9):1275–1280)

- Thank you for this suggestion. We have compared our results with previous literature on FNB needles, with references cited.

3) Add, as a limitation, the use of different FNB needle types.

- The limitation section has been amended and now states, “Limitations of our study include its retrospective nature, being a single-center experience, the use of multiple FNB needle types, and the heterogeneity of lesion types sampled.”

4) As well, the heterogeneity of the population included (i.e., pancreas and other organs sampled, solid and cystic lesions) should be mentioned as a limitation.

- We have incorporated this into our manuscript.

TABLES:
1) Please, provide a table where demographic, technical characteristics and lesions features of the 3 groups are compared.

- A table of baseline characteristics has now been added as Table 1 in the manuscript.