

Appropriate Use of Endoscopic Ultrasound Biopsy in the Diagnosis of Pancreatic Neuroendocrine Tumors In the SSTR PET Era: Results from an International Delphi Consensus Study

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BACKGROUND

- EUS biopsy used in the diagnostic workup of PNETs is invasive and associated with risks such as bleeding and pancreatitis.
- Guidelines lack clarity regarding the appropriate use of preoperative EUS biopsy in the SSTR PET era.

METHODS

- Three-round modified Delphi process
- Expert panel recruited
- Baseline statements developed
- Voting rounds via Qualtrics
- Consensus achieved with >80% agreement

*Abbreviations:

- SSTR PET: Somatostatin Receptor Positron Emission Tomography
- EUS: Endoscopic Ultrasound
- PNET: Pancreatic Neuroendocrine Tumor

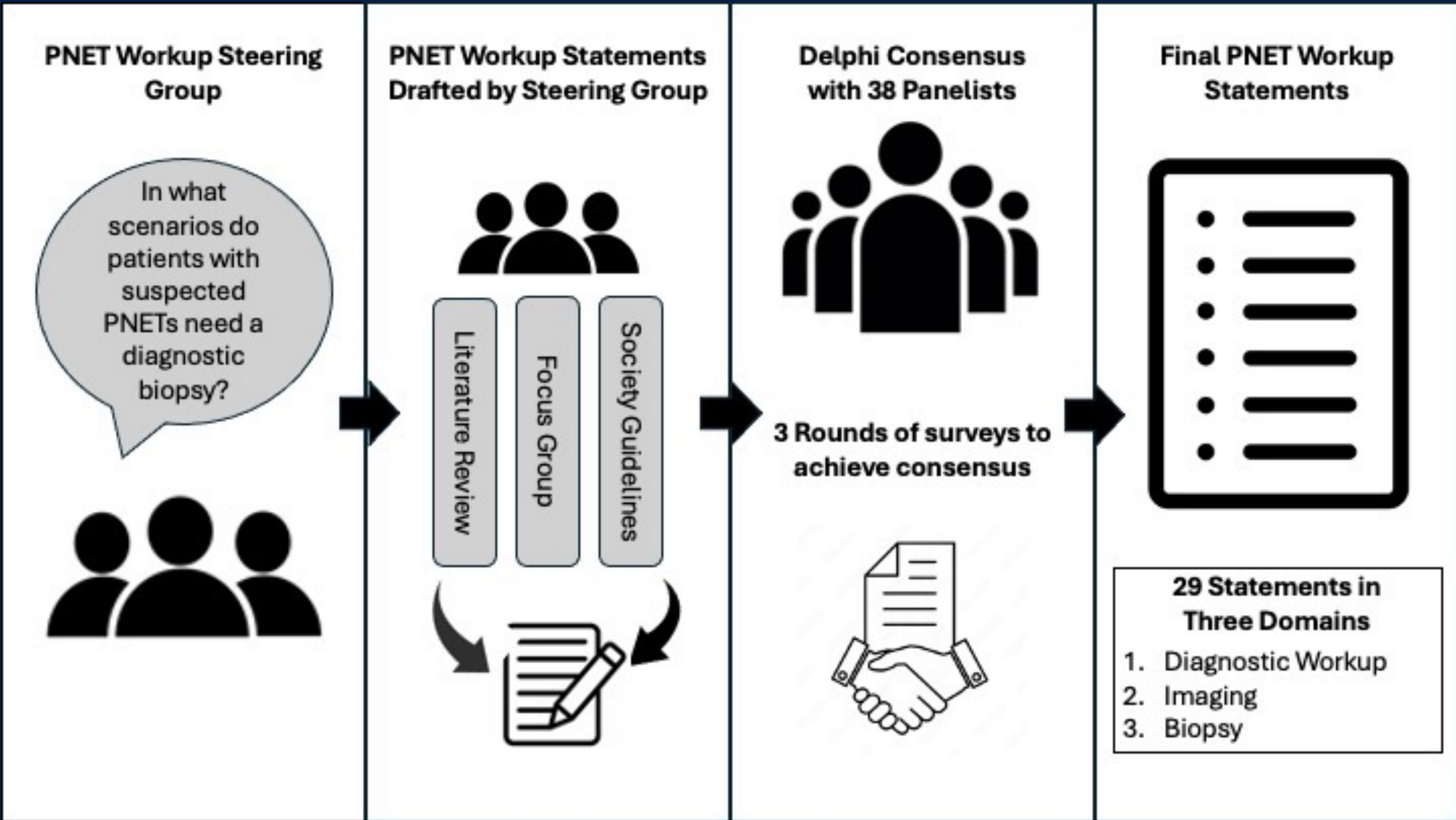


Table 1. Expert Panelist Characteristics

	Number of Panelists (%)
Practice Setting	
Academic	33 (86.8)
Private	3 (7.9)
Community	1 (2.6)
Federal/Government Hospital	1 (2.6)
Specialty	
Surgical Oncology	13 (34.2)
Medical Oncology	8 (21.1)
Gastroenterology	8 (21.1)
Radiology	2 (5.3)
Nuclear Medicine	3 (7.9)
Pathology	4 (10.5)
Years in Practice, mean (range)	13.4 (3-34)
Institution sees >20 PNET patients per year?	
Yes	36 (94.7)
No	2 (5.3)

Table 2. Example Consensus Statement From Each Domain

Diagnostic Workup: For a patient who is a surgical candidate with a >2cm pancreatic mass suspicious for nonfunctional PNET based on multiphase CT findings and initial laboratory evaluation:
Somatostatin Receptor (SSTR) PET imaging, if available, is the most appropriate next step for workup and staging.
Imaging
Low SUV max and poor correlation with high resolution CT findings are features on SSTR PET/CT or PET/MR that are concerning for high-grade PNET and should prompt tissue sampling of the mass and possibly FDG PET/CT for evaluation of metastatic disease.
Biopsy
When obtaining tissue, tissue sampling of an abnormal lymph node in lieu of the pancreatic mass is acceptable if deemed to be lower risk and in-room cytology is present to confirm the diagnosis.



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RESULTS

- 38 panelists recruited
- 97%, 100%, and 100% response rates in rounds 1, 2, and 3, respectively
- Cronbach’s alpha of 0.91 and 0.85 in rounds 1 and 2, respectively

CONCLUSION

The Delphi method was successfully employed to generate consensus on the proper use of EUS biopsy in the diagnostic workup of PNETs in the era of SSTR PET imaging

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