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Original Article

Colonoscopy quality requisites for selecting surveillance intervals: A World Endoscopy Organization Delphi Recommendation

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Background and Aims: Different post-polypectomy guidelines underscore the need for high-quality baseline colonoscopy before appropriate surveillance recommendations can be made. Standards for colonoscopy practice have been advocated by gastrointestinal societies. Our aims were to define standards for the procedural practice of colonoscopy in this particular setting of surveillance and to generate a colonoscopy procedural quality checklist that could be implemented in clinical practice.

Methods: This study was based on the Delphi process methodology. The baseline questionnaire included 12 domains and 56 individual statements. A total of three rounds were carried out between September 2015 and March 2016 until consensus or lack of consensus was reached.

Results: In total, consensus was reached on 27 statements in nine domains. High levels of agreement and consensus were reached that: (i) colonoscopy should be considered complete only if the whole cecum has been inspected, including the ileocecal valve and the appendiceal orifice (agreement score 4.63; degree of consensus 82%); (ii) quality of the bowel preparation should always be reported (agreement score 4.9, degree of consensus 94%); and (iii) it is preferable to use a segmental validated scale (agreement score 4.36, degree of consensus 86%). Consensus was also reached regarding multiple statements related to documentation of polyps and their resection. Finally, a colonoscopy quality checklist was drafted.

Conclusion: Consensus on different statements regarding quality of colonoscopy has been reached. Based on this consensus, we propose a colonoscopy quality checklist that would be helpful for post-polypectomy surveillance recommendations.

Key words: colonoscopy, colorectal cancer, prevention, quality, surveillance

INTRODUCTION

SURVEILLANCE AFTER POLYP excision is a leading indication for colonoscopy. Practice guidelines recommend post-polypectomy surveillance intervals based on the estimated risk of metachronous neoplasia, which depends on the size, number, and histology of adenomas and serrated lesions found at baseline.[1–3] However, adenoma and serrated polyp detection rates, as well as other quality standards,[4–6] vary widely among endoscopists, highly influencing the chance of post-colonoscopy cancers, maybe more than the advised interval.[7]

Different guidelines on surveillance underscore the need for high-quality baseline colonoscopy before appropriate follow-up recommendations can be made.[1–3] However, these guidelines do not specify the quality requisites that a baseline colonoscopy must fulfill.[8] Although general quality of colonoscopy guidelines[9,10] can be applied at index colonoscopy before indicating post-polypectomy surveillance, there are some peculiarities of this indication not adequately

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addressed in this particular setting. This lack of guidance is particularly concerning when surveillance recommendations are made by clinicians who are not intimately familiar with colonoscopy quality standards. Low-quality colonoscopy could be considered adequate for recommending a specific surveillance interval, or excessive concern over missed lesions when procedure quality has been adequate could lead to inappropriately short surveillance intervals. As surveillance recommendations could also be made, in some settings, by clinicians who do not routinely carry out colonoscopy, it is important to clarify when a colonoscopy is adequate for making these recommendations.

Our primary aim was to examine and define standards of colonoscopy that are specifically required for making recommendations regarding surveillance. Our secondary aim was to generate a colonoscopy procedural quality checklist that could easily be implemented in clinical practice.

METHODS

Study design

THIS STUDY WAS based on the Delphi process methodology and was developed through a web application (http://calite-revista.umh.es/delphi).[11] In this process, a steering committee develops a baseline questionnaire with multiple statements and, then, each member of an expert group reviews and indicates a level of agreement with each specific item. Successive rounds identify those elements for which a high degree of consensus is achieved.

Steering committee

The steering committee was composed of 16 endoscopy specialists with expertise in colorectal cancer screening and surveillance, assembled under a World Endoscopy Organization (WEO) expert working group on surveillance after colonic neoplasm. Wide geographic diversity, including Europe (n = 7), North America (n = 5), and the Asia-Pacific region (n = 4) was considered.

Baseline questionnaire

The baseline questionnaire was developed based on literature review. Search terms were: colonoscopy, quality, surveillance, polypectomy, bowel preparation, endoscopy report, adenoma, polyp, serrated polyp. Members of the steering committee conducted an extensive literature search for relevant English language articles on post-polypectomy surveillance and quality of colonoscopy, up to March 2014. This search included relevant post-polypectomy surveillance guidelines[1–3] and references related to quality of colonoscopy. The references cited by guidelines and the initial set of original research articles were reviewed to identify additional pertinent literature.

The finalized baseline questionnaire elements were discussed in person during the Digestive Disease Week meeting in Washington, DC, in 2015 and by electronic communication. The questionnaire included 12 domains and 56 individual statements. The domains were classified into three areas: completeness of the examination (four domains; 12 statements), appropriateness of colonic cleansing (two domains; 11 statements), and completeness of polyp excision (six domains; 33 statements; Appendix S2).

Expert panel

A total of 18 experts were invited to participate in the successive rounds of the Delphi process, together with the 16 steering committee members. The experts were selected because of their expertise in colonoscopy, all of them with clinical and/or research involvement in this field (see Appendix S1). International representation has been ensured, with participants from Europe (n = 9), North America (n = 4), South America (n = 2) and the Asia-Pacific region (n = 3).

Delphi rounds and consensus meeting

Agreement with each statement was scored using a Likert scale with five possible answers (strongly disagree: 1 point, disagree: 2 points, neither agree nor disagree: 3 points, agree: 4 points, strongly agree: 5 points). Participants were allowed to include personal opinions as well as new proposals about each item.

A total of three rounds were carried out between September 2015 and March 2016 until consensus or lack of consensus was reached (Fig. 1). Participants received feedback about the results after each round. Consensus was defined using two measures: first, as an average score for the agreement (agreement score) with the statement equal or higher than 4 points (agree–strongly agree), or equal or lower than 2 points (disagree–strongly disagree); and second, as a degree of consensus between panelists higher than 75%. The variation coefficient was adopted as measure of the degree of consensus and was calculated as:

$$100 - (\text{Standard deviation/average score} \times 100).$$

Once consensus was reached, if the agreement score was equal to or higher than 4 points, the statement was accepted. In contrast, when the agreement score was equal to or lower than 2 points, the statement was rejected. Statements with an

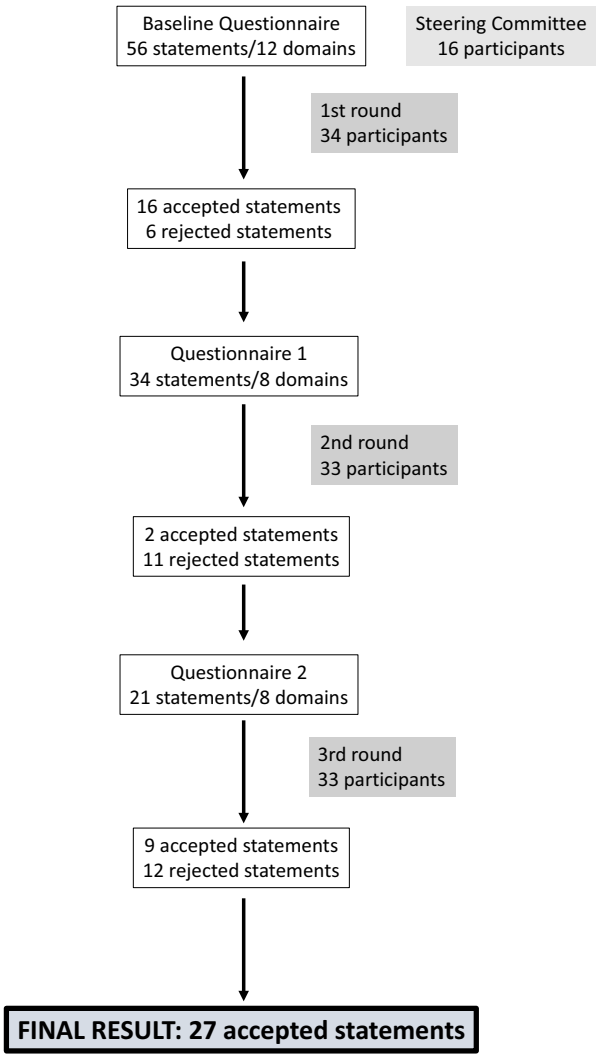

Figure 1 Structure of the Delphi process.

intermediate score (2–4 points) were reconsidered in the subsequent round. Rephrasing of statements when consensus was not reached was carried out with the aim to arrive at consensus, guided by participant comments and discussion.

Results from the first two rounds were analyzed in a meeting during the United European Gastroenterology Week in Barcelona, Spain, in 2015, where a decision was made to pursue a third round in order to refine some items. During two teleconferences with members of the steering committee, rephrasing of specific statements with borderline agreement was done with the aim to try to reach a higher degree of consensus. A third and final round was carried out following the same criteria as for the initial two rounds. Finally, during the Digestive Disease Week meeting in San Diego, CA, in May 2016, a meeting was held, discussion on the statements to be included in the final document was carried out, and the final document was approved.

RESULTS

IN TOTAL, AGREEMENT and consensus was reached on 27 statements in nine domains. (Table 1). Figure 1 shows the structure of the Delphi process. Statements with no agreement and consensus can be seen in Table 2. Some of these sentences without consensus have been considered as research questions and can be seen in Table 3.

Completeness of the examination

Consensus was reached that colonoscopy should be considered complete only if the whole cecum has been inspected, including the ileocecal valve and the appendiceal orifice (agreement score 4.63; degree of consensus 82%), and that cecal landmarks should always be documented with a photograph (agreement score 4.09; degree of consensus 89%; Table 1). Cecal landmarks include both ileocecal valve and appendiceal orifice.

Statements addressing the ascertainment of completeness of examination of the entire colonic mucosa, such as consideration about quality indicators of endoscopists such as the withdrawal time or the adenoma detection rate of the individual endoscopist, did not reach adequate agreement or consensus. None of the statements regarding the alternative use of CT colonography for surveillance when optical colonoscopy is incomplete reached adequate agreement or consensus (Table 2).

Appropriateness of bowel cleansing

High levels of agreement and consensus were reached that the quality of the bowel preparation should always be reported (agreement score 4.91, degree of consensus 94%). There was consensus that it is preferable to use a validated scale to describe the bowel preparation (agreement score 4.36, degree of consensus 82%), that a segmental validated scale, such as the Boston scale is preferred (agreement score 4.15, degree of consensus 77%), and that the quality of the bowel preparation should be assessed only after rinsing/washing is complete (agreement score 4.24, degree of consensus 80%; Table 1). There was consensus that if bowel preparation is considered inadequate for providing surveillance recommendations, the colonoscopy should be repeated in <1 year (agreement score 4.03, degree of consensus 81%; Table 1).

Table 1 Statements with consensus

Domain	Sentence	Agreement score	Degree of consensus (%)	SD
Completeness of the examination				
Extent of colonoscopy should be considered complete only if:	The whole cecum has been inspected, including the ileocecal valve and the appendiceal orifice	4.63	82	0.83
Regarding documentation of the completeness of the colonoscopy:	Cecal landmarks should always be documented with a photograph	4.09	89	0.52
Cleanliness of the colon				
Regarding bowel preparation, provide adequate surveillance recommendations:	Quality of the bowel preparation should always be reported	4.91	94	0.29
	It is preferable to use a validated scale to describe the bowel preparation	4.36	82	0.78
	It is preferable to use a segmental validated scale, such as the Boston scale	4.15	77	0.95
	The quality of the bowel preparation should be assessed only after rinsing/washing is complete	4.24	80	0.85
Indication for surveillance	If bowel preparation is considered inadequate for providing surveillance recommendations, the colonoscopy should be repeated in <1 year	4.03	81	0.77
Completeness of polyp excision				
Evaluation of completeness of polypectomy before giving surveillance recommendations:	In the case of piecemeal polypectomy, evaluation of the completeness of the polypectomy should be assessed by the endoscopist	4.50	85	0.68
	In the case of en bloc polypectomy (1 piece), evaluation of the completeness of the polypectomy should be assessed by the endoscopist	4.13	81	0.78
Regarding the endoscopy report: the following information should be included in order to provide optimal surveillance recommendations	Total number of polyps	4.61	87	0.60
	Total number of polyps removed	4.73	90	0.47
	Total number of polyps retrieved	4.53	82	0.82
	Size of each polyp	4.67	90	0.47
	Location of each polyp	4.34	85	0.65
	Morphology of each polyp	4.36	81	0.83
	Use of piecemeal *vs* "en bloc" resection for each polyp	4.47	87	0.58
	Method of excision of each polyp	4.36	81	0.83
	Assessment of the completeness of excision of each polyp	4.48	84	0.72
Regarding the pathology report, provide optimal surveillance recommendations:	Histopathological diagnosis for each retrieved polyp is necessary	4.27	80	0.85
	Grade of dysplasia for each retrieved polyp is necessary	4.19	77	0.96
	Presence of villous component of retrieved polyps is necessary	4.36	81	0.83
	In the case of piecemeal polypectomy, polyp size measured by endoscopists is preferred	4.41	85	0.66
	Total number of adenomas must be known	4.52	87	0.59
	Total number of adenomas and serrated polyps must be reported	4.45	86	0.62
After piecemeal polypectomy, early (3–6 months) inspection of the polypectomy site:	Should be carried out after piecemeal polypectomy of polyps ≥20 mm	4.50	85	0.68
Regarding tattoos:	Large polyps (≥20 mm) resected in a piecemeal method	3.97	76	0.95
Tattooing should always be used for:	Polyps with suspicion of invasive carcinoma	4.84	91	0.44

Table 2 Statements with no consensus

Domain	Sentence	Agreement score	Degree of consensus (%)	SD
Completeness of the examination				
Extent of the colonoscopy should be considered complete only if:	Ileocecal valve and appendiceal orifice have been inspected	3.17	55	1.43
	Colonoscopy should be considered as complete only if ileocecal valve, appendiceal orifice and medial wall of the cecum, beneath the ileocecal valve have been inspected	3.47	73	0.94
Regarding documentation of the completeness of the colonoscopy:	It is sufficient to mention the landmarks in the written report	2.58	54	1.19
	Landmarks should always be documented with video	2.25	56	0.99
If colon exploration has been completed using CT colonography because of incomplete optical colonoscopy, the following statements apply:	If CT colonography does not detect new polyps, surveillance should be recommended based on the initial incomplete colonoscopy findings	3.72	74	0.97
	If CT colonography does not detect new polyps, surveillance colonoscopy should be scheduled earlier than recommended by surveillance guidelines after complete optical	2.82	58	1.18
	CT colonography adequately surveys for polyps in the colonic mucosa that is not visualized due to incomplete colonoscopy	3.78	73	1.00
Regarding ascertainment of complete examination of the entire colonic mucosa	Reporting colonoscopy withdrawal time should be mandatory to consider the colonoscopy adequate for giving surveillance recommendations	3.28	63	1.21
	Endoscopists with mean withdrawal times (measured in normal exams) longer than acceptable standards can extend surveillance intervals	2.16	71	0.63
	Endoscopists with adenoma detection rates higher than acceptable standards can extend the surveillance intervals to their patients	2.56	67	0.85
Cleanliness of the colon				
Regarding bowel preparation, provide adequate surveillance recommendations:	Quality of the bowel preparation should be reported using a validated scale (such as Aronchick)	3.65	70	1.05
	Quality of the bowel preparation can be reported using the terms “adequate” or “inadequate”	3.03	63	1.12
	Quality of the bowel preparation can be reported using the terms “adequate” or “inadequate”, only if the evaluation is provided for each colon segment	2.68	56	1.18
Indication for surveillance	Post-polypectomy surveillance guidelines recommendations can only be provided for colonoscopies with a good or excellent bowel preparation according to the Aronchick scale	3.29	64	1.18
	A qualitative scale such as excellent, good, and fair is sufficient to describe the bowel preparation	3.00	65	1.15
	Any score lower than 2 points in any colonic segment in the Boston Bowel Prep scale indicates that post-polypectomy surveillance guidelines recommendations cannot be applied	3.77	70	1.13
	If bowel preparation is considered inadequate for providing surveillance recommendations, the colonoscopy should be repeated as soon as possible	3.48	68	1.11
Completeness of polyp excision				
Evaluation of completeness of polypectomy before giving surveillance recommendations:	Evaluation of completeness of polypectomy can be assessed appropriately by the endoscopist	3.41	72	0.95
	Evaluation of completeness of polypectomy should be confirmed by a pathologist	2.88	66	0.98
	In the case of en bloc polypectomy (1 piece), evaluation of the completeness of the polypectomy should be assessed by the pathologist	3.84	70	1.15

Table 2 (*Continued*)

Domain	Sentence	Agreement score	Degree of consensus (%)	SD
Regarding the endoscopy report: the following information should be included in order to provide optimal surveillance recommendations	Detailed individual per-polyp information is always required	3.70	67	1.22
Regarding the pathology report, provide optimal surveillance recommendations:	Polyp size measured by pathologists is preferred	2.64	60	1.06
	Polyp size measured by endoscopists is preferred	3.79	70	1.14
	Polyp size measured by endoscopists should only be used for polyps that have not been retrieved or were removed in piecemeal method	2.58	57	1.11
	In the case of an en bloc resection, the polyp size measured by the endoscopist is preferred	3.77	71	1.09
	In the case of an en bloc resection, the polyp size measured by the pathologist is preferred	3.00	60	1.20
	When inconsistencies between endoscopist's measure and pathologist's measure occur, the largest measure should be used	3.55	69	1.10
	For polyps that are not retrieved for histopathology, the endoscopic diagnosis can be used	3.76	63	1.02
After piecemeal polypectomy, early (3–6 months) inspection of the polypectomy site:	Should always be carried out	3.09	62	1.17
	Should be carried out only for polyps ≥10 mm	3.68	71	1.07
	Should always be carried out with (electronic) chromoendoscopy	3.23	62	1.23
	Should always include a biopsy of the polypectomy site	2.82	59	1.16
	Depends on the particular characteristics of the polypectomy—hence, no guidelines can be recommended	2.81	66	0.96
Polyp location	Should be reported by anatomical site and not by centimeters from the anus	3.57	68	1.14
	Should be reported by centimeters from the anus	2.48	64	0.89
	Should be reported by both anatomical site and centimeters from the anus	3.07	62	1.17
	Should be reported by either anatomical site or centimeters from the anus	2.55	59	1.04
Regarding tattoos:	Large polyps (≥10 mm) resected in a piecemeal method	3.00	65	1.05
Tattooing should always be used for:	Polyps where there was uncertainty about completeness of resection	3.85	73	1.04

CT, computed tomography.

Completeness of polyp excision

Agreement between experts was achieved about the role of the endoscopist in the evaluation of the completeness of polypectomy (Table 1) both in cases of piecemeal resection (agreement score 4.50, degree of consensus 85%) and also in cases of "en bloc" resection (agreement score 4.13, degree of consensus 81%).

Consensus was reached regarding multiple statements related to documentation on polyps. Documentation of the total number of polyps (agreement score 4.61, degree of consensus 87%), total number of polyps removed (agreement score 4.73, degree of consensus 90%) and retrieved (agreement score 4.53, degree of consensus 82%), size of each polyp (agreement score 4.67, degree of consensus 90%), location of each polyp (agreement score 4.34, degree of consensus 85%), and morphology of each polyp (agreement score 4.36, degree of consensus 81%) were considered necessary before making surveillance recommendations (Table 1). Documentation of the use of piecemeal versus "en bloc" resection for each polyp (agreement score 4.47, degree of consensus 87%), method of excision of each polyp

Table 3 Research questions

1. When CT colonography is used for incomplete colonoscopy, should the post-polypectomy interval be anticipated?
2. Risk of metachronous advanced neoplasia in patients who underwent a negative CT colonography following polypectomy during an incomplete colonoscopy?
3. Should post-polypectomy surveillance be anticipated/related when colonoscopy is carried out by operators with shorter/longer withdrawal time and/or low-/high-detectors?
4. Should colonoscopy be repeated early in the case of a BBPS value ≥6 when a single segment is scored <2?
5. What are the clinical implications in replacing the endoscopy with pathological measurement of the polyp, especially after cold-snaring of <10 mm polyps?
6. What are the additional benefits, if any, in carrying out early surveillance/tattoo of <20 mm polyps removed in a piecemeal method?

BBPS, Boston Bowel Preparation Scale; CT, computed tomography.

(agreement score 4.52, degree of consensus 87%) and serrated polyps (agreement score 4.45, degree of consensus 86%) when available should be documented.

There was also consensus that early (3–6 months) inspection of the polypectomy site should be carried out after piecemeal polypectomy of polyps ≥20 mm (agreement score 4.50, degree of consensus 85%; Table 1). There was agreement that in the case of piecemeal polypectomy, polyp size measured by endoscopists is preferred (agreement score 4.41, degree of consensus 85%). However, no consensus was reached regarding who should define the polyp size in cases of "en bloc" resection (Table 2).

Regarding tattoos, the statement "tattooing should always be used for large polyps (≥20 mm) resected in a piecemeal method" reached borderline agreement and consensus (agreement score 3.97, degree of consensus 76%). The statement "tattooing should always be used for polyps with suspicion of invasive carcinoma" reached high levels of agreement and consensus (agreement score 4.84, degree of consensus 91%; Table 1).

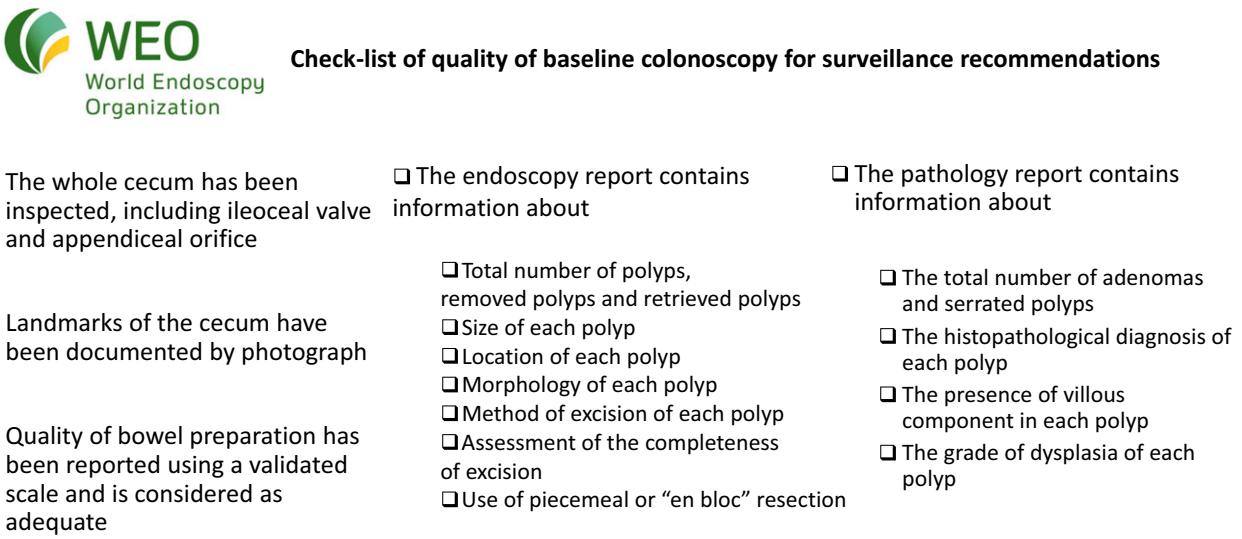

Figure 2 Proposed colonoscopy quality checklist.

(agreement score 4.36, degree of consensus 81%), and assessment of the completeness of excision of each polyp (agreement score 4.48, degree of consensus 84%) were also considered necessary items.

Regarding the pathology report, there was consensus that a histopathological diagnosis (agreement score 4.27, degree of consensus 80%), grade of dysplasia (agreement score 4.19, degree of consensus 77%), and presence of a villous component (agreement score 4.36, degree of consensus 81%) for each retrieved polyp is necessary. Moreover, there was consensus that the total number of adenomas

Colonoscopy quality checklist

Based on the items that achieved consensus, a colonoscopy quality checklist was drafted (Fig. 2).

DISCUSSION

SEVERAL GUIDELINES UNDERSCORE the need for high quality at baseline colonoscopy in order to be able to provide optimal surveillance recommendations, but none of them specify the quality requisites. Using a Delphi

process, an international group of experts in colonoscopy, and colorectal cancer screening and surveillance was able to reach consensus on statements regarding completeness of colon examination, appropriateness of colonic cleansing, and completeness of polyp excision. These particular statements have been specifically focused in the setting of the indication for surveillance after polyp excision and are complementary to other quality guidelines recommendations, such as the recently published European Society of Gastrointestinal Endoscopy (ESGE) performance measures for lower gastrointestinal endoscopy.[10] Our secondary aim was to generate an easy-to-use onsite checklist of quality items that must be fulfilled before recommending a surveillance interval in order to improve clinical practice. All the information required by such a checklist should be readily available in endoscopic and pathology reports, supporting the feasibility of the checklist's immediate implementation.

Post-polypectomy surveillance is one of the leading indications of colonoscopy.[8,12] Unfortunately, there is substantial evidence of its inappropriate use, with both overutilization and underutilization.[8,13,14] In order to minimize such variability, international and national guidelines have been developed and are widely publicized among the endoscopic communities. According to such documents, appropriate surveillance indications may be given only after a high-quality baseline colonoscopy. However, in clinical practice, post-polypectomy surveillance recommendations could be made by clinicians who may not be very familiar with colonoscopy quality metrics, especially in the setting of organized screening programs.[15] In addition, position statements addressing the quality of colonoscopy are generally skewed toward the concern of detection rather than surveillance, as adenoma detection rate and withdrawal time have been associated with the risk of post-colonoscopy interval cancer, irrespective of post-polypectomy surveillance. For an optimal application of current post-polypectomy guidelines, we believed it was critical to fill the gap between post-polypectomy and quality guidelines, defining minimum quality requirements and incorporating them into a practical checklist.

Regarding the completeness of colonoscopy, several statements reached agreement and consensus among participating experts, including that the whole cecum must be explored, with mention and photodocumentation of cecal landmarks. This is of critical importance for at least three reasons. First, incomplete colonoscopy has been associated with a higher risk of post-colonoscopy colorectal cancer, especially right-sided.[9] Second, clear photodocumentation allows sharing of such information among different clinicians. Third, a photodocumentation requirement may itself be a motivator for high-quality colonoscopy.[16] Recent quality guidelines from the American Society for Gastrointestinal Endoscopy[10] as well as the ESGE quality improvement initiative[9] considered photodocumentation of cecal intubation as mandatory. Still photography of the cecum is convincing in the vast majority of cases, and its use allows verification of cecal intubation rates in a continuous quality improvement program.[10] Finally, statements related to the quality of the endoscopists such as withdrawal time or adenoma detection rate did not reach consensus as factors that could potentially influence surveillance intervals.

Regarding colonic cleanliness, there was consensus on the use of validated scales,[17–20] preferably segmental, with evaluation made only after complete washing and rinsing of fecal residues. As expected, the above-mentioned characteristics tended to favor the Boston Bowel Preparation Scale,[21] as its segmental and total scores are to be obtained after cleansing and rinsing.[19] Of note, the use of such a scale has recently been associated with the miss rate of relevant lesions.[22] In addition, adoption of validated bowel preparation scales has been proven feasible in routine practice.[23] Although participants agreed on the need for early repetition of colonoscopy after an inadequate cleansing, there was lack of agreement on further specifying the definition of inadequate cleansing. In contrast, in our study, there was consensus that if bowel preparation was considered inadequate for providing surveillance recommendations, it should be recommended to repeat colonoscopy in <1 year. Although the degree of cleansing cannot be recommended as a pure quality indicator of the procedure, it should be considered in a broader definition of quality, incorporating not only endoscopic or pathological criteria, but also extending to organizational issues.

There was consensus on the need for multiple items related to polyps in both the endoscopy and pathology reports. These included number of polyps and several individual polyp characteristics, such as size, location, and morphology, as well as the resection method and the completeness of resection. Inclusion of these criteria in our proposed checklist would facilitate appropriate application of post-polypectomy surveillance guidelines. Several concerns related to polyp description deserve further attention. No consensus was reached regarding the preferred way to measure polyp size, including that reported by the endoscopist based on *in vivo* estimation or measurement, or that measured by the pathologist on fixed tissue, especially in case of "en bloc" resection. This may relate to participants' reluctance to downgrade the role of endoscopic assessment that is still predominantly used in clinical practice. Further studies are needed to assess the clinical implications of using endoscopic or pathological assessment of size to guide

post-polypectomy recommendations. In contrast, there was consensus that, irrespective of the resection technique, either "en bloc" or piecemeal, the endoscopist should judge the completeness of polyp excision. There was lack of agreement on several topics regarding early inspection of the post-polypectomy site or the use of tattooing. In both cases, consensus was reached only for more extreme scenarios, probably reflecting a high level of variability in clinical practice.

In summary, we designed and implemented a Delphi process to define colonoscopy quality requirements that must be achieved and reported before post-polypectomy surveillance recommendations can be made. Based on our findings, we propose a colonoscopy quality checklist that may be of special help to practitioners who make post-polypectomy surveillance recommendations, but who may not be very familiar with colonoscopy quality metrics. The absence of consensus on certain topics identifies areas of opportunity for future research on the quality of colonoscopy. We anticipate that prospective studies will provide robust evidence regarding optimal surveillance intervals in a context of high-quality baseline colonoscopies.[24]

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CONFLICTS OF INTEREST

ASOCIACIÓN PARA LA Investigación en Gastroenterología de la Provincia de Alicante (AIGPA) declares no conflicts of interest for this article.

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SUPPORTING INFORMATION

ADDITIONAL SUPPORTING INFORMATION may be found in the online version of this article at the publisher's web site.

Appendix S1 Participants in the Delphi group
Appendix S2 Baseline questionnaire