



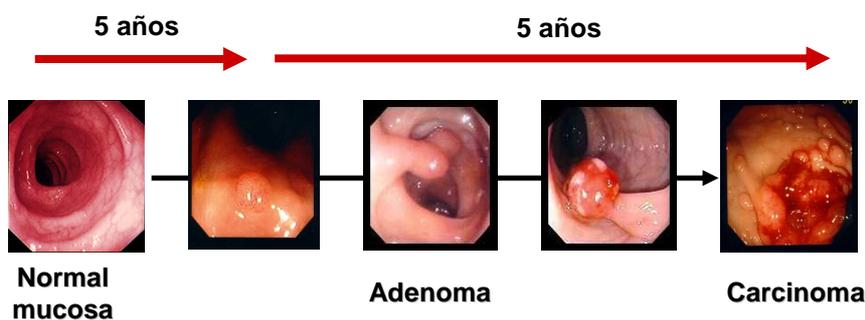
Hospital General  
d'Alicante  
Universitari  
Centre d'Organització de l'Assistència

# VIGILANCIA POST- POLIPECTOMIA RECOMENDACIONES DE LAS GUIAS EUROPEAS DE CALIDAD EN EL CRIBADO DE CANCER COLORRECTAL

Dr Rodrigo Jover  
Unidad de Gastroenterología  
Hospital General Universitario de Alicante  
Reunión Anual Red de Programas de Cribado.  
Oviedo 10-6-2010



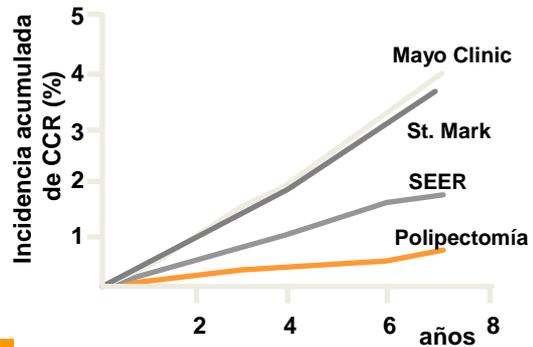
## Historia natural del cáncer colorrectal



Adenoma avanzado (alto riesgo):

- Tamaño > 1 cm
- Componente vellosa
- Displasia de alto grado

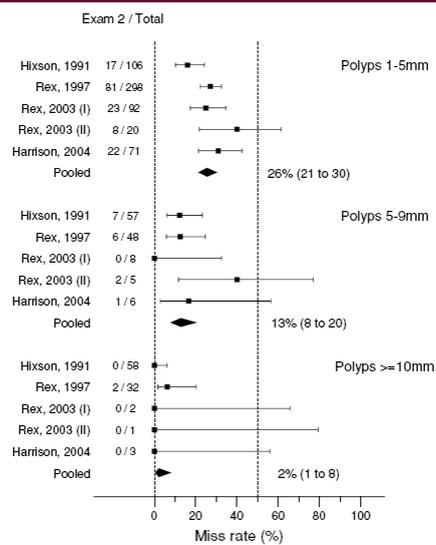
## Polipectomía endoscópica



Evidencia: 1b  
Recomendación: A

Winawer *et al.* NEJM 1993

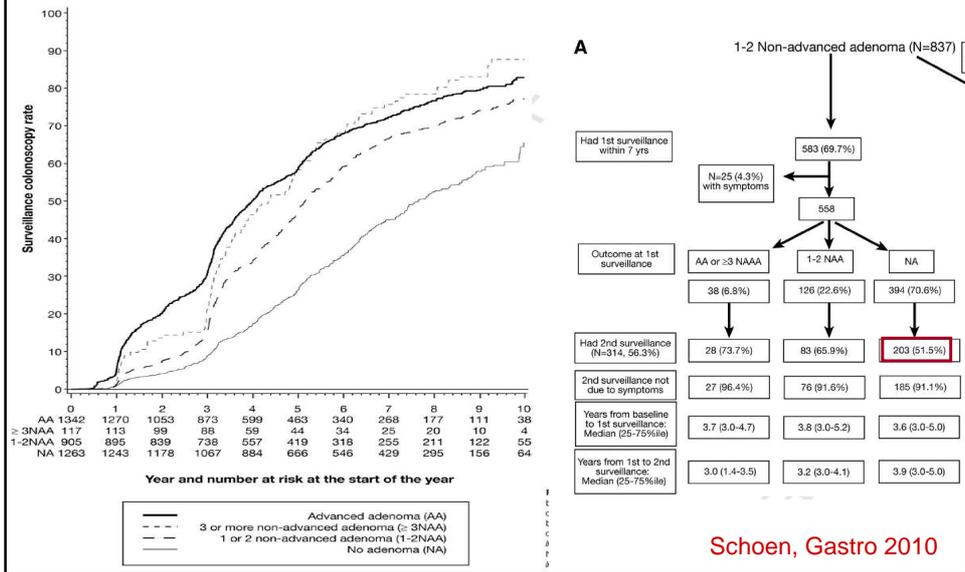
## La colonoscopia no es perfecta



Van Rijn, AJG 2006

Figure 4. Adenoma miss rate by size.

# La colonoscopia de vigilancia se utiliza mal



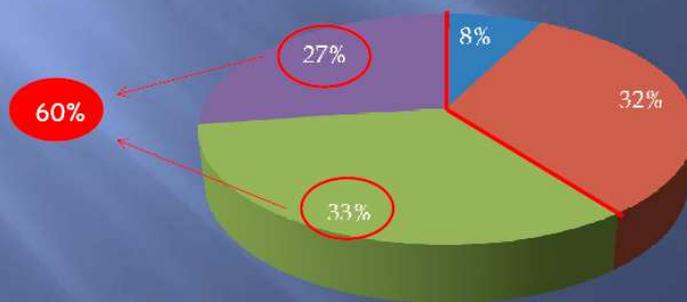
Schoen, Gastro 2010

# Adecuación de la colonoscopia

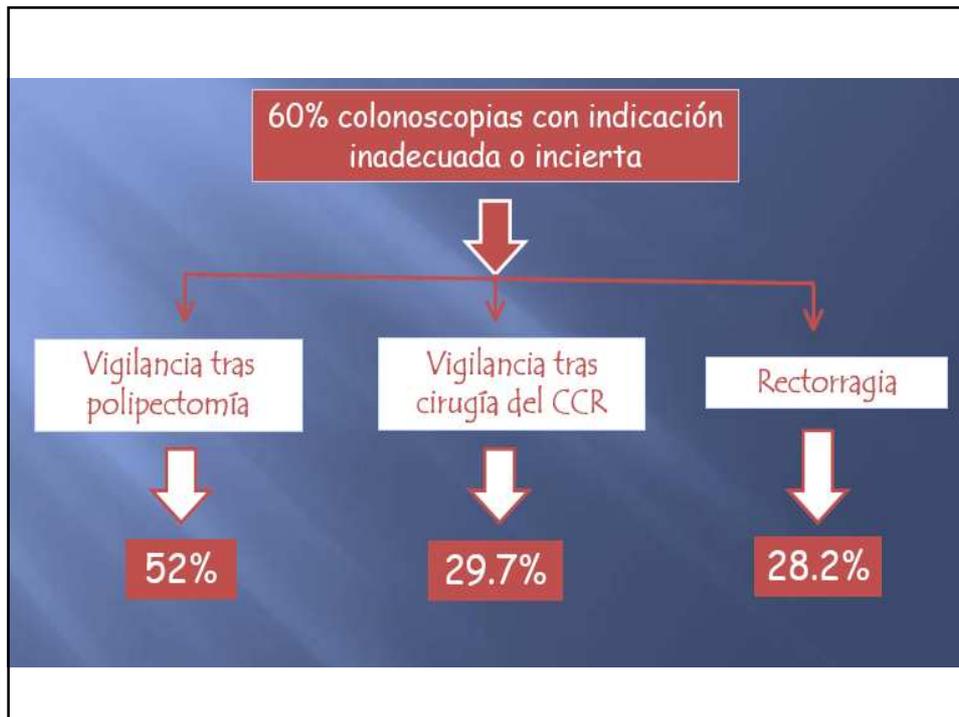
Estudio de la adecuación de la colonoscopia. Hospital La Fe. Valencia

749 colonoscopias (Feb-Mayo 2007)

619 colonoscopias válidas para análisis



■ Adecuada y necesaria 
 ■ Adecuada 
 ■ Incierta 
 ■ Inapropiada



## COLONOSCOPIA DE VIGILANCIA PUNTOS DE PARTIDA

- Nunca nadie ha demostrado que la vigilancia post-polipectomía sea beneficiosa en reducción de incidencia/mortalidad de CCR.
- Los intervalos de vigilancia son arbitrarios y no están basados en ensayos clínicos.
- Las evidencias disponibles son escasas y de poca calidad.
- Se utiliza como indicador un marcador secundario, el adenoma avanzado, cuya tasa de progresión a CCR es también incierta.

## **PRINCIPIOS GENERALES DE LA COLONOSCOPIA DE VIGILANCIA**

- Pacientes con adenomas previos tienen un riesgo aumentado de presentar nuevos adenomas o cáncer
- Los objetivos de la colonoscopia de vigilancia son reducir la incidencia y mortalidad del CCR, extirpando los adenomas de alto riesgo y detectando cáncer en estadio precoz
- La colonoscopia es un procedimiento invasivo y caro. La colonoscopia de vigilancia debe realizarse con la frecuencia mínima que proporcione una protección adecuada frente al desarrollo de cáncer
- La estrategia de vigilancia debe estar basada en una estimación del riesgo

## **FACTORES DE RIESGO PARA ADENOMA/CCR TRAS POLIPECTOMIA**

1. CALIDAD COLONOSCOPIA
2. EXCISION INCOMPLETA DE ADENOMAS
3. CARACTERÍSTICAS DE LOS ADENOMAS EXTIRPADOS
  - Número
  - Tamaño
  - Histología/Displasia
  - Localización
4. CARACTERÍSTICAS DEL PACIENTE
  - Edad y sexo
  - Historia familiar

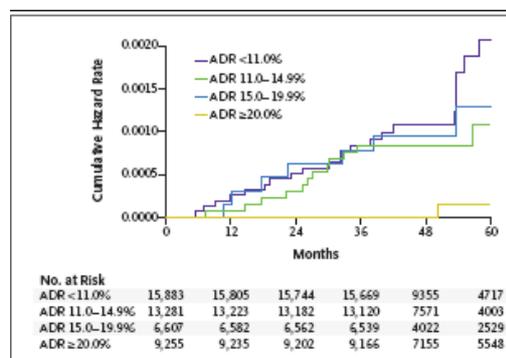
## FACTORES DE RIESGO PARA ADENOMA/CCR TRAS POLIPECTOMIA

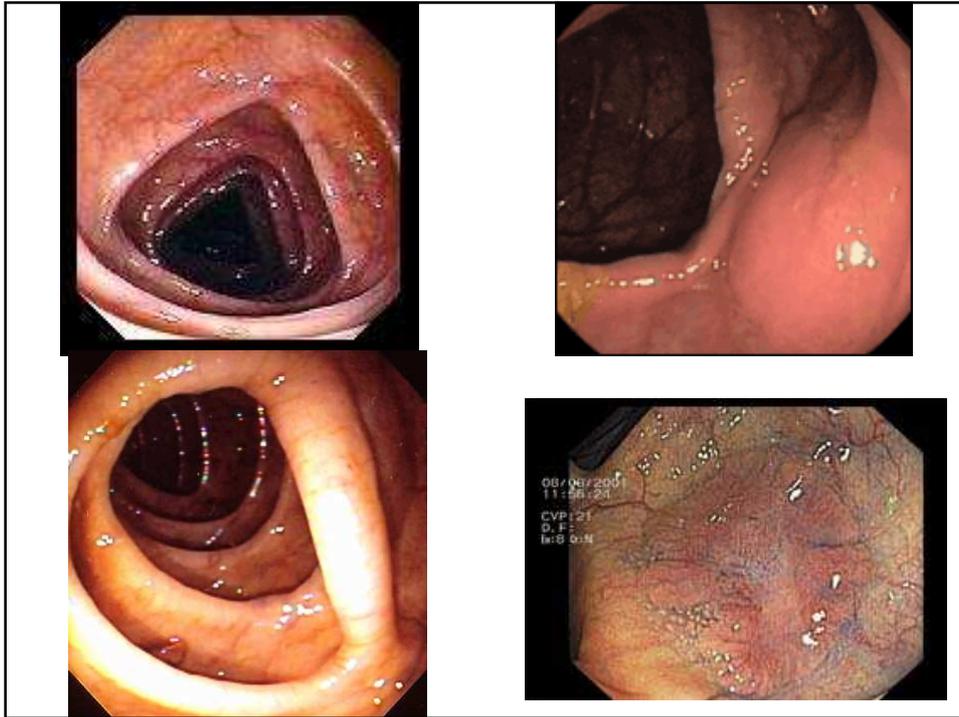
1. CALIDAD DE LA COLONOSCOPIA
2. EXCISION INCOMPLETA DE ADENOMAS
3. CARACTERISTICAS DE LOS ADENOMAS EXTIRPADOS
  1. Número
  2. Tamaño
  3. Histología/Displasia
  4. Localización
4. CARACTERISTICAS DEL PACIENTE
  1. Edad y sexo
  2. Historia familiar

## FACTORES DE RIESGO CALIDAD DE LA COLONOSCOPIA

### Quality Indicators for Colonoscopy and the Risk of Interval Cancer

Michal F. Kaminski, M.D., Jaroslaw Regula, M.D., Ewa Kraszewska, M.Sc.,  
 Marcin Polkowski, M.D., Urszula Wojciechowska, M.D., Joanna Didkowska, M.D.,  
 Maria Zwierko, M.D., Maciej Rupinski, M.D., Marek P. Nowacki, M.D.,  
 and Eugeniusz Butruk, M.D.



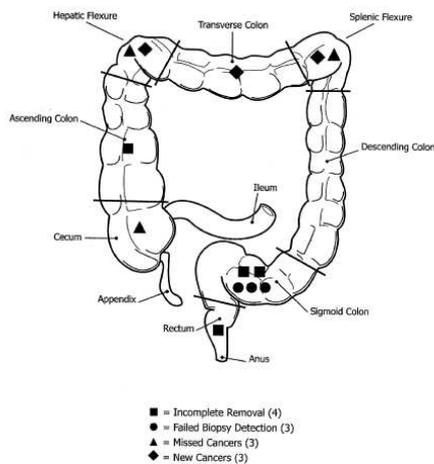


- Es fundamental que la colonoscopia en el programa de cribado sea realizada por endoscopistas y unidades de endoscopia que reúnan los **máximos requisitos de calidad**
- Dos opciones para conseguirlo:
  - **Seleccionar las mejores unidades para el cribado**
  - **Establecer elementos de mejora en la calidad**
- **Monitorizar** el cumplimiento de estándares de calidad

## FACTORES DE RIESGO PARA ADENOMA/CCR TRAS POLIPECTOMIA

1. CALIDAD DE LA COLONOSCOPIA
2. EXCISION INCOMPLETA DE ADENOMAS
3. CARACTERISTICAS DE LOS ADENOMAS EXTIRPADOS
  1. Número
  2. Tamaño
  3. Histología/Displasia
  4. Localización
4. CARACTERISTICAS DEL PACIENTE
  1. Edad y sexo
  2. Historia familiar

## FACTORES DE RIESGO EXCISION INCOMPLETA ADENOMAS



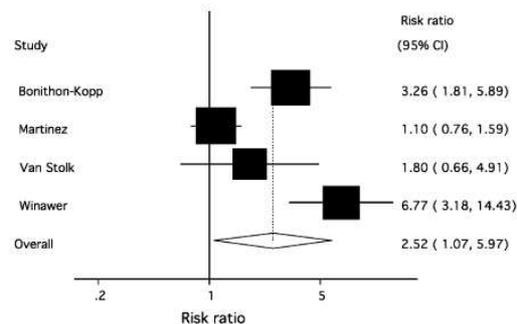
- Si polipectomía fragmentada: colono de vigilancia en 3-6 meses
- Especialmente en adenomas sesiles y/o mayores de 10 mm

Pabby, GIE 2005

## FACTORES DE RIESGO PARA ADENOMA/CCR TRAS POLIPECTOMIA

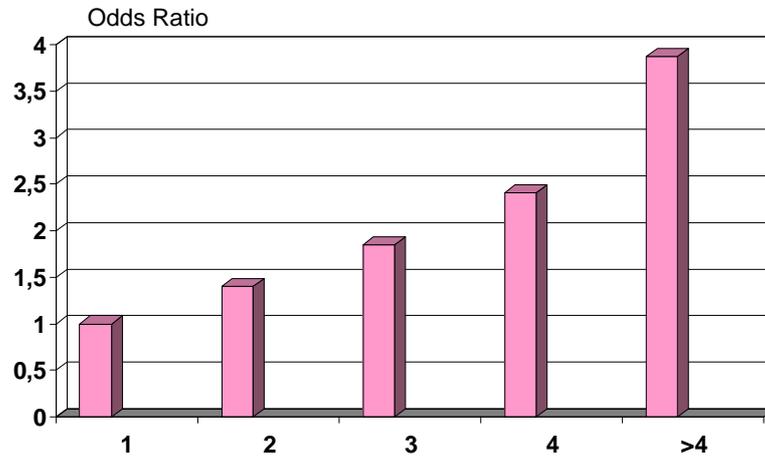
1. CALIDAD DE LA COLONOSCOPIA
2. EXCISION INCOMPLETA DE ADENOMAS
3. CARACTERISTICAS DE LOS ADENOMAS EXTIRPADOS
  - Número
  - Tamaño
  - Histología/Displasia
  - Localización
4. CARACTERISTICAS DEL PACIENTE
  1. Edad y sexo
  2. Historia familiar

## Número de adenomas



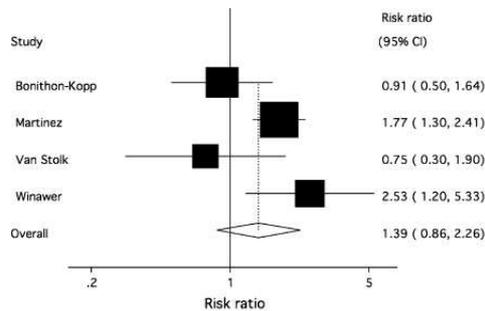
**Figure 2.** RR of advanced adenoma at 3-year surveillance colonoscopy (van Stolk et al had a 4-year surveillance colonoscopy) in patients with  $\geq 3$  versus 1 to 2 adenomas at index colonoscopy. The RRs are 3.26 (95% CI 1.81-5.89) for Bonithon-Kopp et al,<sup>17</sup> 1.10 (95% CI 0.76-1.59) for Martinez et al,<sup>6</sup> 1.80 (95% CI 0.66-4.91) for van Stolk et al,<sup>8</sup> and 6.77 (95% CI 3.18-14.43) for Winawer et al.<sup>3</sup>

# Número de adenomas



Martinez, Gastro 2009

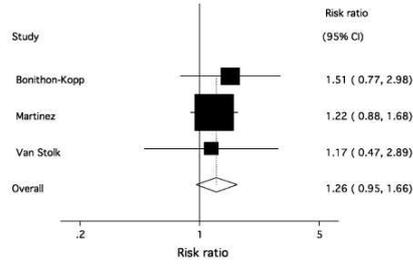
# Tamaño adenomas



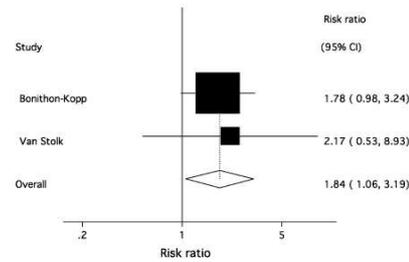
**Figure 3.** RR of advanced adenoma at 3-year surveillance colonoscopy (van Stolk et al had a 4-year surveillance colonoscopy) in patients with large (>1 cm) versus small ( $\leq$ 1 cm) adenomas at index colonoscopy. The RRs are 0.91 (95% CI 0.50-1.64) for Bonithon-Kopp et al,<sup>17</sup> 1.77 (95% CI 1.30-2.41) for Martinez et al,<sup>6</sup> 0.75 (95% CI 0.30-1.90) for van Stolk et al,<sup>8</sup> and 2.53 (95% CI 1.20-5.33) for Winawer et al.<sup>3</sup>

Saini, GIE 2006

# Histologia adenomas



**Figure 4.** RR of advanced adenoma at 3-year surveillance colonoscopy (van Stolk et al had a 4-year surveillance colonoscopy) in patients with tubulovillous/villous versus tubular adenomas at index colonoscopy. The RRs are 1.51 (95% CI 0.77-2.98) for Bonithon-Kopp et al.<sup>17</sup> 1.22 (95% CI 0.88-1.68) for Martinez et al.<sup>6</sup> and 1.17 (95% CI 0.47-2.89) for van Stolk et al.<sup>8</sup> Data could not be extracted for Winawer et al.<sup>3</sup>



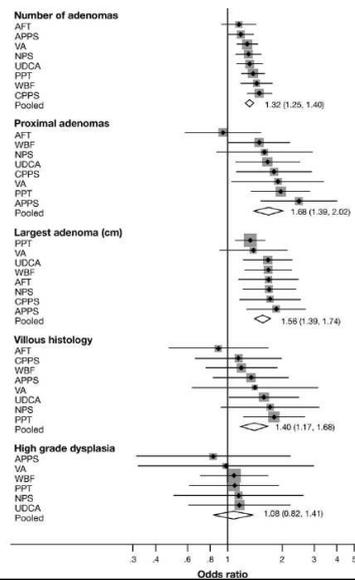
**Figure 5.** RR of advanced adenoma at 3-year surveillance colonoscopy (van Stolk et al had a 4-year surveillance colonoscopy) in patients with nonmild dysplasia versus mild dysplasia at index colonoscopy. The RRs are 1.78 (95% CI: 0.98-3.24) for Bonithon-Kopp et al.<sup>17</sup> and 2.17 (95% CI 0.53-8.93) for van Stolk et al.<sup>8</sup> Data could not be extracted for Martinez et al.<sup>6</sup> or Winawer et al.<sup>3</sup>

Saini, GIE 2006

# CARACTERISTICAS DE LOS ADENOMAS nº, tamaño, histología y localización

## A Pooled Analysis of Advanced Colorectal Neoplasia Diagnoses After Colonoscopic Polypectomy

MARÍA ELENA MARTÍNEZ,<sup>1,4</sup> JOHN A. BARON,<sup>5</sup> DAVID A. LIEBERMAN,<sup>1</sup> ARTHUR SCHATZKIN,<sup>6</sup> ELAINE LANZA,<sup>4</sup> SIDNEY J. WINAWER,<sup>11</sup> ANN G. ZAUBER,<sup>12</sup> RUYUN JIANG,<sup>13</sup> DENNIS J. AHNEN,<sup>14</sup> JOHN H. BOND,<sup>15</sup> TIMOTHY R. CHURSON,<sup>16</sup> DOUGLAS J. ROBERTSON,<sup>16</sup> STEPHANIE A. SMITH-WARNER,<sup>17</sup> ELIZABETH T. JACOBS,<sup>17</sup> DAVID S. ALBERTS,<sup>1,11,11</sup> and E. ROBERT GREENBERG<sup>14,14</sup>



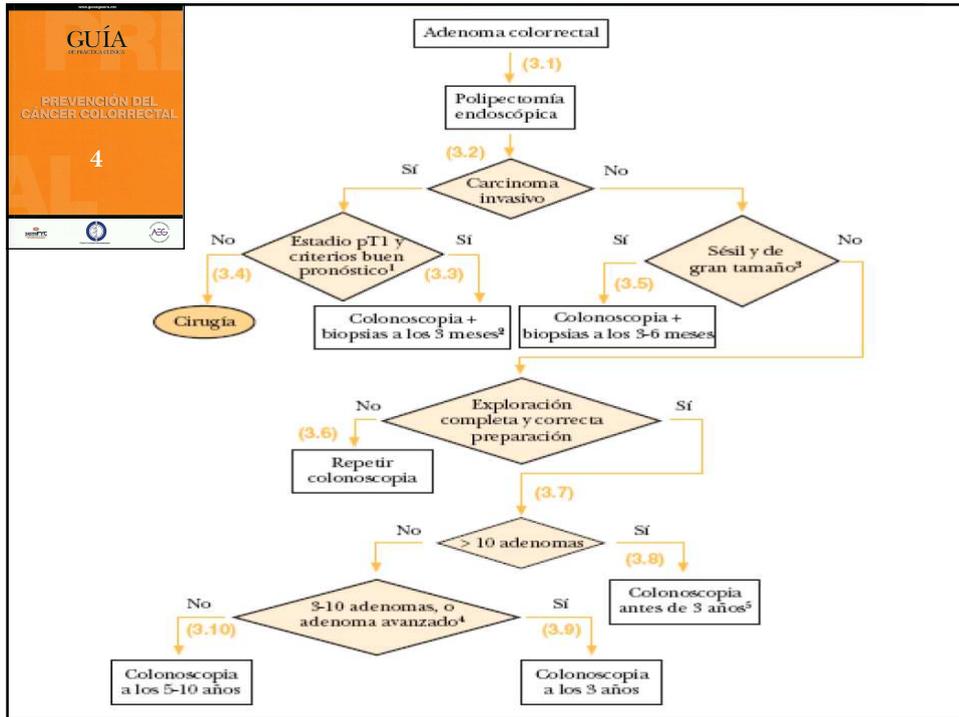
## FACTORES DE RIESGO PARA ADENOMA O CANCER TRAS POLIPECTOMIA

1. CALIDAD DE LA COLONOSCOPIA
2. EXCISION INCOMPLETA DE ADENOMAS
3. CARACTERISTICAS DE LOS ADENOMAS EXTIRPADOS
  1. Número
  2. Tamaño
  3. Histología/Displasia
  4. Localización
4. CARACTERISTICAS DEL PACIENTE
  - Edad y sexo
  - Historia familiar

**Table 5. Pooled Odds Ratios of Colorectal Neoplasia for Baseline Patient and Adenoma Characteristics**

**Martínez, Gastro 2009**

Characteristic	Crude OR (95% CI)		Adjusted OR* (95% CI)	
	Nonadvanced	Advanced	Nonadvanced	Advanced
<b>Age (y)</b>				
<40	0.39 (0.26-0.59)	0.32 (0.14-0.73)	0.47 (0.31-0.72)	0.41 (0.18-0.94)
40-49	0.68 (0.57-0.81)	0.61 (0.45-0.85)	0.72 (0.60-0.87)	0.67 (0.48-0.93)
50-59	1.00	1.00	1.00	1.00
60-69	1.13 (1.01-1.26)	1.56 (1.31-1.86)	1.10 (0.98-1.24)	1.39 (1.16-1.68)
70-79	1.25 (1.10-1.43)	2.09 (1.72-2.52)	1.21 (1.05-1.38)	1.72 (1.40-2.11)
80+	1.16 (0.66-2.05)	2.59 (1.30-5.15)	1.24 (0.69-2.25)	2.70 (1.31-5.57)
			P trend < .0001	P trend < .0001
<b>Sex</b>				
Female	1.00	1.00	1.00	1.00
Male	1.56 (1.41-1.72)	1.50 (1.29-1.74)	1.45 (1.30-1.62)	1.40 (1.19-1.65)
<b>Race</b>				
White	1.00	1.00	1.00	1.00
Black	1.11 (0.92-1.34)	0.97 (0.73-1.30)	1.12 (0.92-1.37)	1.08 (0.79-1.47)
Other	0.72 (0.59-0.89)	0.74 (0.54-1.01)	0.83 (0.67-1.03)	0.83 (0.60-1.16)
<b>Family history of colorectal cancer<sup>b</sup></b>				
No	1.00	1.00	1.00	1.00
Yes	1.12 (1.00-1.24)	1.11 (0.94-1.29)	1.15 (1.03-1.29)	1.17 (0.99-1.38)
<b>Cigarette smoking status<sup>c</sup></b>				
Never	1.00	1.00	1.00	1.00
Former	1.20 (1.08-1.33)	1.23 (1.05-1.43)	1.07 (0.96-1.20)	1.08 (0.92-1.27)
Current	1.17 (1.02-1.35)	1.11 (0.90-1.38)	1.16 (1.00-1.35)	1.13 (0.90-1.42)
<b>Body mass index (kg/m)<sup>2d</sup></b>				
<25	1.00	1.00	1.00	1.00
25 to <30	1.23 (1.10-1.38)	1.09 (0.93-1.29)	1.10 (0.98-1.24)	1.00 (0.84-1.19)
30+	1.32 (1.16-1.51)	1.13 (0.94-1.36)	1.23 (1.08-1.41)	1.13 (0.93-1.38)
			P trend = .003	P trend = .226
<b>Previous polyp<sup>e</sup></b>				
No	1.00	1.00	1.00	1.00
Yes	1.50 (1.34-1.66)	1.95 (1.68-2.26)	1.37 (1.21-1.55)	1.76 (1.48-2.09)
<b>Adenoma number</b>				
1	1.00	1.00	1.00	1.00
2	1.58 (1.42-1.77)	1.81 (1.54-2.14)	1.48 (1.30-1.64)	1.39 (1.17-1.66)
3	2.38 (2.04-2.79)	2.85 (2.30-3.54)	2.05 (1.73-2.42)	1.85 (1.46-2.34)
4	2.70 (2.09-3.48)	4.11 (2.99-5.63)	2.23 (1.71-2.92)	2.41 (1.71-3.40)
5+	4.30 (3.33-5.56)	6.94 (5.12-9.40)	3.63 (2.76-4.78)	3.87 (2.76-5.42)
			P trend < .0001	P trend < .0001
<b>Adenoma location<sup>f</sup></b>				
Distal colorectum	1.00	1.00	1.00	1.00
Any proximal	1.78 (1.62-1.95)	2.27 (1.98-2.60)	1.29 (1.16-1.44)	1.68 (1.43-1.98)
<b>Size of largest adenoma, mm</b>				
<5	1.00	1.00	1.00	1.00
5 to <10	1.03 (0.92-1.16)	1.15 (0.95-1.39)	1.01 (0.90-1.14)	1.17 (0.95-1.42)
10 to <20	0.92 (0.82-1.04)	2.18 (1.82-2.62)	0.94 (0.82-1.08)	2.27 (1.84-2.78)
20+	1.02 (0.84-1.23)	2.92 (2.28-3.73)	1.00 (0.80-1.25)	2.99 (2.24-4.00)
			P trend = .4944	P trend < .0001
<b>Adenoma histology</b>				
Tubular <sup>g</sup>	1.00	1.00	1.00	1.00
Tubulovillous/villous <sup>h</sup>	1.09 (0.97-1.22)	1.96 (1.69-2.27)	1.05 (0.92-1.20)	1.28 (1.07-1.52)
<b>High-grade dysplasia</b>				
No	1.00	1.00	1.00	1.00
Yes	1.16 (0.97-1.38)	1.77 (1.41-2.22)	1.04 (0.86-1.26)	1.05 (0.81-1.35)



-DO NOT DISTRIBUTE-  
Publication in preparation  
All rights reserved by the authors

**European Guidelines for Quality Assurance  
in Colorectal Cancer Screening**

# 9

## Colonoscopic surveillance after adenoma removal

**Authors:**  
Wendy Atkin  
Roland Valori  
Ernst J. Kuipers  
Geir Hoff  
Carlo Senore  
Nereo Segnan  
Rodrigo Jover  
Wolf Schmiegal  
René Lambert  
Christian Pox

Network Version NW 2.0

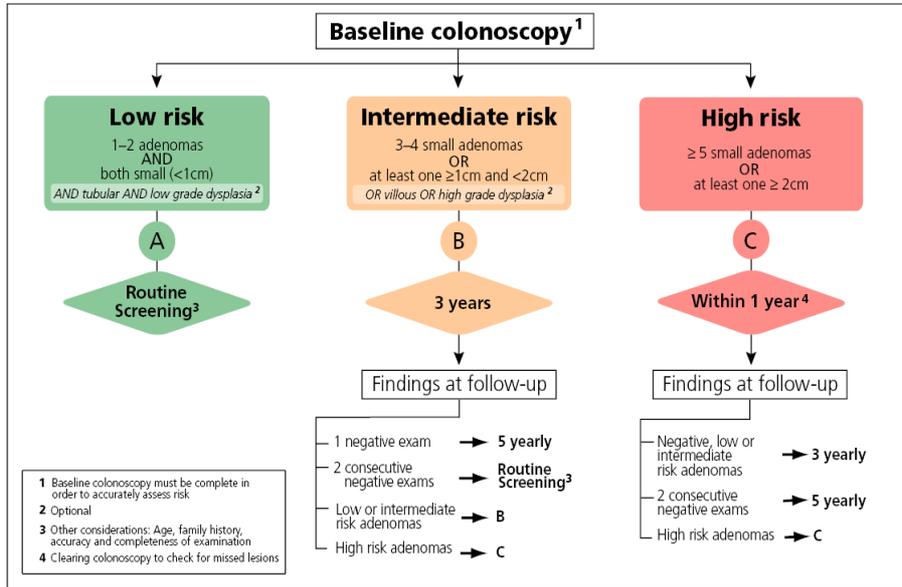
### DRAFT

DO NOT DISTRIBUTE

ALL RIGHTS RESERVED



## COLONOSCOPIC SURVEILLANCE FOLLOWING ADENOMA REMOVAL (2009)



RISK FACTOR AT ENROLLMENT	No. (%) WITH ADVANCED FEATURES/ No. EXAMINED <sup>†</sup>	MULTIVARIATE ODDS RATIO (95% CI) <sup>‡</sup>	P VALUE
<b>No. of adenomas</b>			
1	6/541 (1.1)	1.0	<0.001
2	4/200 (2.0)	1.5 (0.4–5.6)	
≥ 3	18/197 (9.1)	6.9 (2.6–18.3)	
<b>Size of largest adenoma</b>			
Small	3/228 (1.3)	1.0	0.35
Medium	8/354 (2.3)	1.3 (0.3–5.2)	
Large	17/356 (4.8)	2.2 (0.6–7.8)	
<b>Age</b>			
<60 yr	6/380 (1.6)	1.0	0.13
≥60 yr	22/558 (3.9)	2.0 (0.8–5.0)	

\*An adenoma with advanced pathological features was defined as any adenoma that was large (>1.0 cm) or had high-grade dysplasia or invasive cancer.

<sup>†</sup>Number of patients in two-examination and one-examination groups combined who returned for a first follow-up examination, categorized according to number and size of adenoma and age at enrollment.

<sup>‡</sup>CI denotes confidence interval.

Winawer, NEJM 1993

# GRUPO DE BAJO RIESGO

**Table 4.** Relative Risk of Advanced Neoplasia Within 5.5 Years Based on Baseline Finding

Baseline finding (n with examination)	No advanced neoplasia, n (%)	Advanced neoplasia, n (%)	RR <sup>a</sup>	95% CI	P value	Cancer n (%)	HGD/cancer per 1000 person-yr (95% CI)
No neoplasia (298)	291 (97.6)	7 (2.4)	1.00			1 (0.3)	0.7 (0–2.0)
Tub Ad <10 mm (622)	584 (93.9)	38 (6.1)	2.56	1.16–5.67	.02	4 (0.6)	1.5 (0–2.9)
<u>1 or 2 (496)</u>	473 (95.4)	23 (4.6)	<u>1.92</u>	<u>0.83–4.42</u>	<u>.13</u>	3	1.4 (0–2.9)
>3 (126)	111 (88.1)	15 (11.9) <sup>b</sup>	5.01	2.10–11.96	<.001	1	1.9 (0–5.5)
Tub Ad >10 mm (123)	104 (84.6)	19 (15.5)	6.40	(2.74–14.94)	<.001	1 (0.8)	6.4 (0–13.5)
Villous adenoma (81)	68 (83.9)	13 (16.1)	6.05	(2.48–14.71)	<.001	1 (1.2)	6.2 (0–14.7)
HGD (46)	38 (82.6)	8 (17.4)	6.87	(2.61–18.07)	<.001	2 (4.4)	26.0 (3.2–48.8)
Cancer (23)	15 (65.2)	8 (34.8)	13.56	(5.54–33.18)	<.001	5 (21.7)	74.8 (14.9–134.7)
Number of adenomas <sup>c</sup> at baseline (n)							
1 or 2 (617)	577	40 (6.5)				7 (1.1)	3.3 (1.2–5.5)
3 or 4 (145)	122	23 (15.9)				2 (1.4)	6.6 (0.1–13.0)
5–9 (64)	53	11 (17.2)				3 (4.7)	13.1 (0.0–27.9)
10+ (8)	7	1 (12.5)				0	0.0

Lieberman, Gastro 2007

## Once-only flexible sigmoidoscopy screening in prevention of colorectal cancer: a multicentre randomised controlled trial

Wendy S Atkin, Rob Edwards, Ines Kralj-Hans, Kate Wooldrage, Andrew R Hart, John M A Northover, D Max Parkin, Jane Wardle, Stephen W Duffy, Jack Cuzick, UK Flexible Sigmoidoscopy Trial Investigators

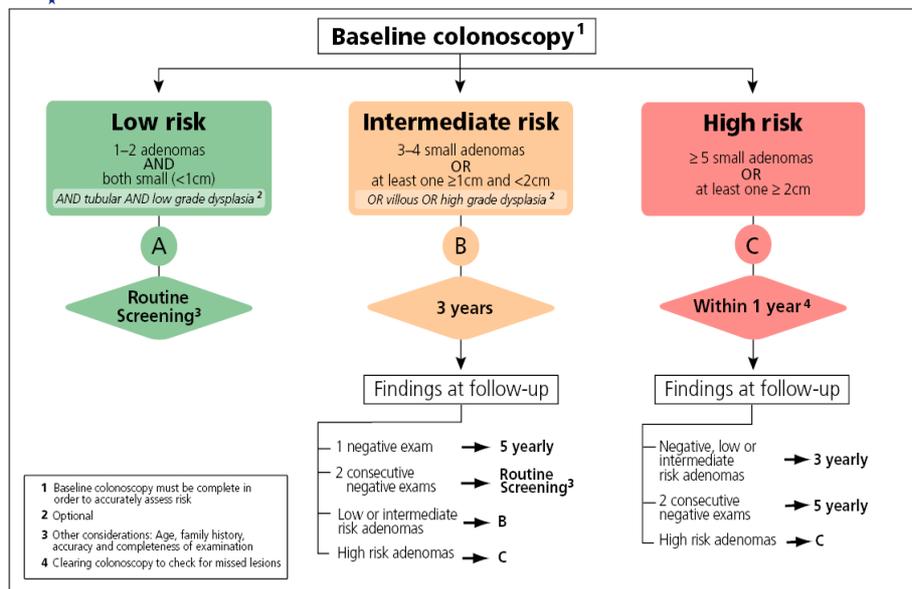
Lancet, 2010

### Screening procedure

Flexible sigmoidoscopy screening was done in hospital endoscopy clinics. Details of the screening procedure are described elsewhere.<sup>7</sup> Briefly, participants underwent flexible sigmoidoscopy with polypectomy for small polyps and referral for colonoscopy if they had polyps meeting any of the following high-risk criteria: 1 cm or larger; three or more adenomas; tubulovillous or villous histology; severe dysplasia or malignant disease; or 20 or more hyperplastic polyps above the distal rectum. Individuals who had no polyps or only low-risk polyps at flexible sigmoidoscopy were discharged. The occurrence of adverse physical and psychological effects associated



## COLONOSCOPIC SURVEILLANCE FOLLOWING ADENOMA REMOVAL (2009)



## GRUPO DE RIESGO INTERMEDIO

FINDING	2 EXAMINATIONS (N = 338)	1 EXAMINATION* (N = 428)	RELATIVE RISK (95% CI)†	P VALUE
	<i>no. (%) of patients</i>			
Any adenoma detected	141 (41.7)	137 (32.0)	1.3 (1.1–1.6)	0.006
Adenoma with advanced pathological features‡	11 (3.3)§	14 (3.3)	1.0 (0.5–2.2)	0.99

\*Referent category.

†CI denotes confidence interval.

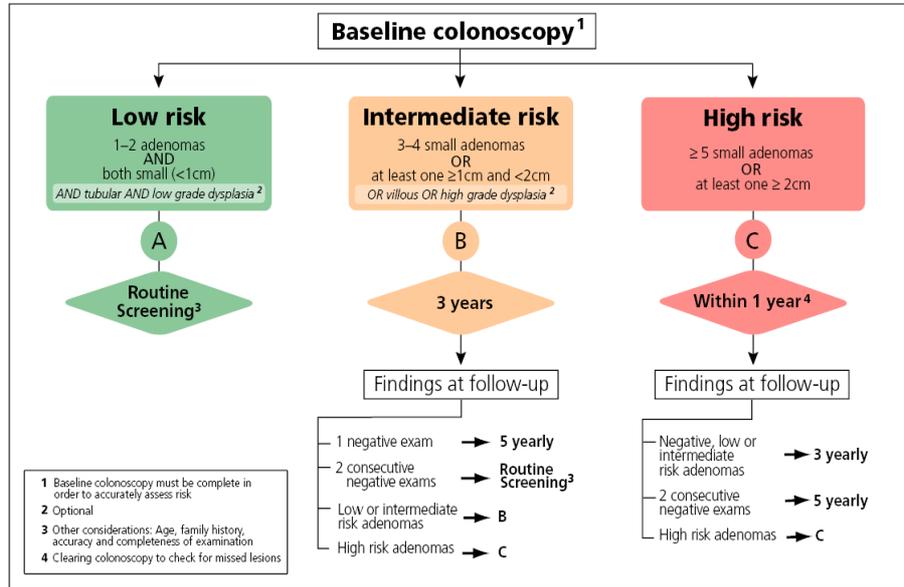
‡Any adenoma that was large (>1.0 cm) or had high-grade dysplasia or invasive cancer.

§These values are based only on patients who returned for both examinations.

Winawer, NEJM 1993



## COLONOSCOPIC SURVEILLANCE FOLLOWING ADENOMA REMOVAL (2009)



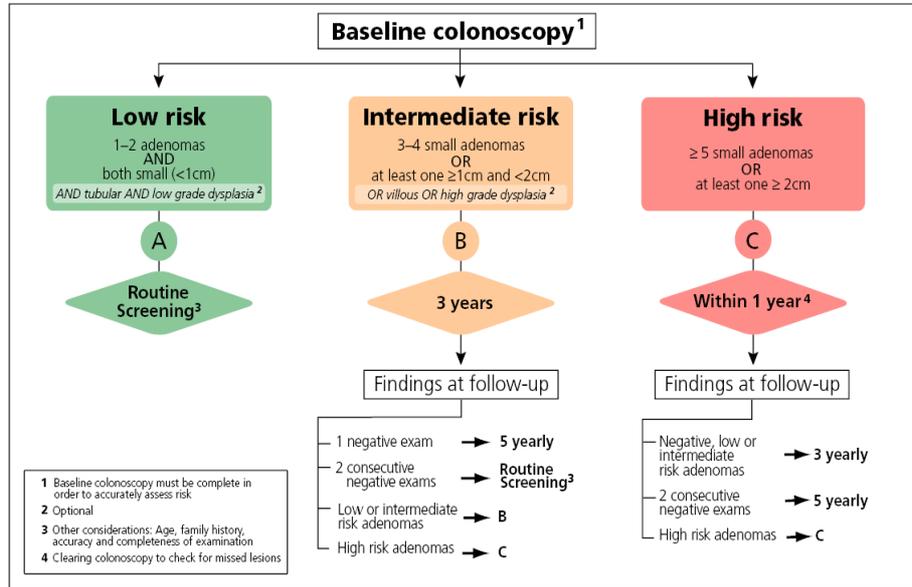
Copyright © 2009 V.1.20/7/09 W. Atkin et al. The work may be copied as long as this notice remains intact. No unauthorised revision or modification of the work is permitted.

**Table 5. Pooled Odds Ratios of Colorectal Neoplasia for Baseline Patient and Adenoma Characteristics**

Characteristic	Crude OR (95% CI)		Adjusted OR* (95% CI)	
	Nonadvanced	Advanced	Nonadvanced	Advanced
Age (y)				
<40	0.39 (0.26–0.59)	0.32 (0.14–0.73)	0.47 (0.31–0.72)	0.41 (0.18–0.94)
40–49	0.65 (0.57–0.81)	0.61 (0.45–0.85)	0.72 (0.60–0.87)	0.67 (0.48–0.93)
50–59	1.00	1.00	1.00	1.00
60–69	1.13 (1.01–1.26)	1.56 (1.31–1.86)	1.10 (0.98–1.24)	1.39 (1.16–1.68)
70–79	1.25 (1.10–1.43)	2.09 (1.72–2.52)	1.21 (1.05–1.38)	1.72 (1.40–2.11)
80+	1.16 (0.66–2.05)	2.59 (1.30–5.15)	1.24 (0.69–2.25)	2.70 (1.31–5.57)
			<i>P</i> trend < .0001	<i>P</i> trend < .0001
Sex				
Female	1.00	1.00	1.00	1.00
Male	1.56 (1.41–1.72)	1.50 (1.29–1.74)	1.45 (1.30–1.62)	1.40 (1.19–1.65)
Race				
White	1.00	1.00	1.00	1.00
Black	1.11 (0.92–1.34)	0.97 (0.73–1.30)	1.12 (0.92–1.37)	1.08 (0.79–1.47)
Other	0.72 (0.59–0.89)	0.74 (0.54–1.01)	0.83 (0.67–1.03)	0.83 (0.60–1.16)
Family history of colorectal cancer <sup>b</sup>				
No	1.00	1.00	1.00	1.00
Yes	1.12 (1.00–1.24)	1.11 (0.94–1.29)	1.15 (1.03–1.29)	1.17 (0.99–1.38)
Cigarette smoking status <sup>c</sup>				
Never	1.00	1.00	1.00	1.00
Former	1.20 (1.08–1.33)	1.23 (1.05–1.43)	1.07 (0.96–1.20)	1.08 (0.92–1.27)
Current	1.17 (1.02–1.35)	1.11 (0.90–1.38)	1.16 (1.00–1.35)	1.13 (0.90–1.42)
Body mass index (kg/m <sup>2</sup> ) <sup>d</sup>				
<25	1.00	1.00	1.00	1.00
25 to <30	1.23 (1.10–1.38)	1.09 (0.93–1.29)	1.10 (0.98–1.24)	1.00 (0.84–1.19)
30+	1.32 (1.16–1.51)	1.13 (0.94–1.36)	1.23 (1.08–1.41)	1.13 (0.93–1.38)
			<i>P</i> trend = .003	<i>P</i> trend = .226
Previous polyp <sup>e</sup>				
No	1.00	1.00	1.00	1.00
Yes	1.50 (1.34–1.66)	1.95 (1.68–2.26)	1.37 (1.21–1.55)	1.76 (1.48–2.09)
Adenoma number				
1	1.00	1.00	1.00	1.00
2	1.58 (1.42–1.77)	1.81 (1.54–2.14)	1.46 (1.30–1.64)	1.39 (1.17–1.66)
3	2.35 (2.04–2.79)	2.85 (2.30–3.54)	2.05 (1.73–2.42)	1.85 (1.46–2.34)
4	2.70 (2.09–3.48)	4.11 (2.99–5.63)	2.23 (1.71–2.92)	2.41 (1.71–3.40)
5+	4.30 (3.33–5.56)	6.94 (5.12–9.40)	3.63 (2.76–4.78)	3.87 (2.76–5.42)
			<i>P</i> trend < .0001	<i>P</i> trend < .0001
Adenoma location <sup>f</sup>				
Distal colorectum	1.00	1.00	1.00	1.00
Any proximal	1.78 (1.62–1.95)	2.27 (1.98–2.60)	1.29 (1.16–1.44)	1.66 (1.43–1.98)
Size of largest adenoma, mm				
<5	1.00	1.00	1.00	1.00
5 to <10	1.03 (0.92–1.16)	1.15 (0.95–1.39)	1.01 (0.90–1.14)	1.17 (0.95–1.42)
10 to <20	0.92 (0.82–1.04)	2.18 (1.82–2.62)	0.94 (0.82–1.08)	2.27 (1.84–2.78)
20+	1.02 (0.84–1.23)	2.92 (2.28–3.73)	1.00 (0.80–1.25)	2.99 (2.24–4.00)
			<i>P</i> trend = .4944	<i>P</i> trend < .0001
Adenoma histology				
Tubular <sup>g</sup>	1.00	1.00	1.00	1.00
Tubulovillous/villous <sup>h</sup>	1.09 (0.97–1.22)	1.96 (1.69–2.27)	1.05 (0.92–1.20)	1.28 (1.07–1.52)
High-grade dysplasia				
No	1.00	1.00	1.00	1.00
Yes	1.16 (0.97–1.38)	1.77 (1.41–2.22)	1.04 (0.86–1.26)	1.05 (0.81–1.35)



## COLONOSCOPIC SURVEILLANCE FOLLOWING ADENOMA REMOVAL (2009)



Copyright © 2009 V.1.207/09 W. Atkin et al. The work may be copied as long as this notice remains intact. No unauthorised revision or modification of the work is permitted.



## RESUMEN

- Tres grupos de riesgo
- **BAJO RIESGO:** vuelven al programa de cribado para riesgo medio
- **RIESGO INTERMEDIO:** colono en 3 años
- **ALTO RIESGO:** colono de aclarado en 1 año