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ORAL PRESENTATIONS

SESSION 10 – UNFINISHED AGENDA FOR *HELICOBACTER PYLORI*

10.05.

EXPERIENCE WITH RIFABUTIN-CONTAINING THERAPY IN 900 PATIENTS FROM THE EUROPEAN REGISTRY ON *HELICOBACTER PYLORI* MANAGEMENT (HP-EUREG)

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Objective: While first-line therapies for *Helicobacter pylori* (*H. pylori*) are well established, optimal rescue regimens remain unclear.
Materials and Methods: We aimed to evaluate the effectiveness and safety of rifabutin-containing therapies. Data were obtained from the European Registry on *H. pylori* Management (Hp-EuReg, World-HpReg partner), an international, prospective registry. Patients receiving rifabutin between January 2013 and January 2026 were analyzed. Effectiveness was assessed using modified intention-to-treat (mITT) and per-protocol (PP) analyses, with quality-controlled data.
Results: Overall, 969 patients were included (mean age 52 years; 71% female), mainly from Italy (71%) and Spain (23%). Culture results (available in 62%) showed high antibiotic resistance rates, with dual resistance (clarithromycin-metronidazole) in 43% and triple resistance (clarithromycin-metronidazole-levofloxacin) in 36%. Rifabutin was mainly used as second- (26%), third- (24%), and fourth-line (28%) therapy, achieving mITT eradication rates of 82%, 80%, and 67%, respectively. Most patients (87%) received rifabutin-based triple therapy (proton pump inhibitor [PPI]-rifabutin-amoxicillin), with 75% effectiveness. In an additional 10% of patients, bismuth was added (PPI-rifabutin-amoxicillin-bismuth quadruple therapy), achieving 72% effectiveness. Optimized regimens (14 days with standard- or high-dose PPIs) improved effectiveness to 86% for triple therapy and 75% for bismuth quadruple therapy. Treatment adherence was 91%. Adverse events (AEs) occurred in 21% of patients, most commonly nausea (6.4%). One serious AE (0.5%) was reported. AEs were significantly less frequent with triple therapy than with bismuth quadruple therapy (14% *vs.* 38%; $p<0.001$).
Conclusions: Rifabutin-containing regimens are effective and generally safe rescue options for *H. pylori* eradication, even after multiple treatment failures, although there is still room for improvement.

Conflicts of Interest
Olga P. Nyssen: None, Matteo Pavoni: None, Giulia Fiorini: None, Ángeles Pérez-Aísa: None, Doron Boltin: None, Giuseppe Losurdo: None, María Soledad Marcos: None, Luis Bujanda: None, Jesús Barrio: None, Fernando Bermejo: None, Antonio Gasbarrini: None, Samuel J. Martínez-Domínguez: None, Virginia Flores: None, Irene Arteagoitia: None, Manuel Jiménez-Moreno: None, Pablo Parra: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: None, Javier P. Gisbert: None.

POSTER PRESENTATIONS

POSTER SESSION 01 - HELICOBACTER 1

P01.05.

HELICOBACTER PYLORI EMPIRICAL FIRST-LINE AND RESCUE TREATMENTS IN PATIENTS ALLERGIC TO PENICILLIN: EXPERIENCE AMONG 2,700 CASES OF THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Evidence on *Helicobacter pylori* (*H. pylori*) eradication in patients' allergies to penicillin is limited. Clarithromycin-metronidazole triple therapy (Triple-CM) has been widely used, although bismuth quadruple therapies are increasingly recommended.

Materials and Methods: We aimed to evaluate the effectiveness of first-line and rescue treatments in patients allergic to penicillin. Data from the European Registry on *H. pylori* Management (Hp-EuReg, WorldHpReg partner) were analyzed (AEGRED-Cap, 2013-January 2026). Effectiveness was assessed using modified intention-to-treat (mITT) analyses.

Results: A total of 2,747 patients were included (70% female; mean age 54 years). Main indications were dyspepsia with normal endoscopy (43%), non-investigated dyspepsia (26%), and peptic ulcer disease (15%). Overall, 77% received first-line therapy, achieving 84% effectiveness (mITT). Main regimens were single-capsule bismuth quadruple therapy (metronidazole-tetracycline-bismuth) (35%), triple-CM (28%), and traditional bismuth quadruple therapy (metronidazole-tetracycline-bismuth) (12%), with

significantly different effectiveness: 92%, 71%, and 93%, respectively (p<0.001). In second-line, the most prescribed regimens were single-capsule therapy (29%) and levofloxacin-clarithromycin/metronidazole triple therapies (16%, and 10%, respectively), showing variable effectiveness (86%, 74%, and 67%, respectively; p<0.01). In rescue therapy (3rd-6th line), the single-capsule regimen remained the most used (29%) and the most effective (88%) (Table 1).

TABLE 1. Modified intention-to-treat effectiveness of first-line, second-line, and rescue (3rd-6th) therapies in penicillin-allergic patients.

	Use n (%)	mITT total n (% success)	95% CI
First-line treatment			
Single-capsule (Pylera®)	734 (35%)	693 (92%)	90-94
Triple C+M	583 (28%)	511 (71%)	67-75
Quadruple M+Tc+B	254 (12%)	241 (93%)	90-96
Quadruple C+M+B	109 (5.2%)	93 (86%)	79-93
Triple C+L	76 (3.6%)	69 (77%)	67-87
Triple M+L	57 (2.7%)	53 (89%)	81-97
Quadruple M+D+B	46 (2.2%)	43 (77%)	64-89
Others	255 (12%)	NA	NA
Second-line treatment			
Single-capsule (Pylera®)	139 (29%)	125 (86%)	79-92
Triple C+L	75 (16%)	66 (74%)	64-85
Triple M+L	48 (10%)	46 (67%)	54-81
Quadruple M+Tc+B	44 (9.2%)	39 (79%)	67-92
Quadruple C+L+B	28 (5.9%)	27 (96%)	89-100
Quadruple M+D+B	21 (4.4%)	21 (48%)	26-69
Triple C+M	20 (4.2%)	20 (55%)	33-77
Quadruple M+L+B	15 (3.1%)	14 (93%)	79-100
Others	53 (18%)	NA	NA
Rescue (3rd-6th line) therapy			
Single-capsule (Pylera®)	45 (29%)	40 (88%)	78-97
Quadruple M+Tc+B	17 (11%)	15 (67%)	43-90
Triple C+L	16 (10%)	15 (53%)	28-78
Triple C+M	9 (5.8%)	8 (0%)	0-32
Others	68 (44%)	NA	NA

Single-capsule (Pylera®) contains metronidazole, tetracycline, and bismuth salts; C: clarithromycin; M: metronidazole; Tc: tetracycline; L: levofloxacin; B: bismuth salts; D: doxycycline; mITT: modified intention-to-treat; CI: confidence interval.

Conclusions: In penicillin-allergic patients, triple-CM should be avoided as first-line therapy due to its lower effectiveness. Bismuth quadruple regimens, particularly the single-capsule formulation, achieve the highest eradication rates and remain the preferred option across treatment lines.

Conflicts of Interest

Olga P. Nyssen: None, Ángeles Pérez-Aísa: None, Bojan Tepes: None, Javier Tejedor-Tejada: None, Irina N. Voynovan: None, Perminder S. Phull: None, Dmitry N. Andreev: None, Alfredo J. Lucendo: None, Samuel J. Martínez-Domínguez: None, Laimas Jonaitis: None, Maja Denkovski: None, José M. Huguet: None, Dmitry S. Bordin: None, Juozas Kupcinskas: None, Mónica Sánchez Alonso: None, Pablo Parra: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: Consultant/Advisory Board: -, Javier P. Gisbert, on behalf of the Hp-EuReg investigators: None.

POSTER SESSION 02 - HELICOBACTER 2

P02.02.

OUTCOMES OF FIRST-LINE EMPIRICAL *HELICOBACTER PYLORI* ERADICATION THERAPY IN AUSTRIA: DATA FROM THE EUROPEAN REGISTRY ON THE MANAGEMENT OF *H. PYLORI* INFECTION (HP-EUREG)

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Objective: In Austria, *Helicobacter pylori* (*H. pylori*) prevalence is ~25%, with clarithromycin resistance ≈15%. Effectiveness >90% is required to justify empirical first-line regimens, but national data are lacking.
Patients and Methods: Multicenter, prospective European registry evaluating real-world management of *H. pylori* infection (Hp-EuReg, WorldHpReg partner) was conducted. Austrian patients receiving empirical first-line treatment (2022-2026) were included. Data were recorded *via* AEG-REDCap e-CRF. Modified intention-to-treat analyses were performed.
Results: Overall, 460 first-line patients (53% female, mean age 54±15 years) were included. Main indications: dyspepsia (57%), gastric cancer prevention (14%), and gastroduodenal ulcer disease (8%). Initial diagnosis was mainly by histology (90%), and post-treatment eradication was assessed using ^{13}C-urea breath test (54%) and stool antigen test (24%). Most prescribed regimens, all combined with a proton pump inhibitor (PPI), were concomitant quadruple therapy with amoxicillin-clarithromycin-metronidazole (concomitant-ACM) (70%), three-in-one single-capsule therapy (Pylera®) with bismuth-tetracycline-metronidazole (16%), and triple therapy with amoxicillin-clarithromycin (triple-AC) (5%). Durations were 14 (55%), 10 (40%), and 7 days (5%). PPI doses were low (88%), standard (5%), and high (7%). Overall effectiveness was 89%; concomitant-ACM and Pylera® achieved 90% and 92%, respectively, while triple-AC reached 80%. Effectiveness increased with duration (90%, 88%, 84% for 14-, 10-, and 7-day regimens) and was 89%, 100%, and 87% with low-, standard-, and high-dose PPIs. Compliance was 95%. Adverse events occurred in 27% of patients, mainly affected by diarrhea (10%) and nausea (6%). Severe adverse events were rare (1%, all anaphylactic reactions).
Conclusions: Concomitant-ACM and Pylera® achieved optimal effectiveness (≥90%) in Austria, supporting their use as empirical first-line options.

Conflicts of Interest
Andreas Blesl: None, Anna-Maria Tiefenthaller: None, Melanie Kienbauer: None, Sonja Heeren: None, Patrick Dinkhauser: None, Karin Steidl: None, Simone Megymorecz: None, Paul Bergmeister: None, Philipp-Johannes Schreiner: None, Andreas Zollner: None, Moritz Meyer: None, Pablo Parra: None, Leticia Moreira: None, Olga P. Nyssen: None, Francis Mégraud: None, Colm O'Morain: None, Javier P. Gisbert: None.

POSTER SESSION 03 - HELICOBACTER 3

P03.06.

REAL-WORLD EFFECTIVENESS OF FIRST-LINE *HELICOBACTER PYLORI* THERAPIES IN GERMANY: ERADICATION OUTCOMES IN A LOW CLARITHROMYCIN-RESISTANCE SETTING USING DATA FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Effectiveness of empirical *Helicobacter pylori* (*H. pylori*) eradication therapy is strongly influenced by clarithromycin resistance. In Germany, clarithromycin resistance rates remain below the 15% threshold in several regions, supporting continued use of clarithromycin-based triple therapy. *H. pylori* eradication is also a key strategy for gastric cancer (GC) prevention; however, real-world data integrating treatment effectiveness and clinical indications remain limited. This study aimed to evaluate eradication rates, treatment patterns, and clinical indications of empirical first-line *H. pylori* therapies in Germany.

Materials and Methods: Multicenter prospective registry evaluating real-world management of *H. pylori* infection (Hp-EuReg, WorldHpReg partner). Patients receiving empirical first-line eradication therapy were included. Data were recorded using an e-CRF at AEG-REDCap (2013-March 2026). Effectiveness was assessed by modified intention-to-treat analysis.

Results: Overall, 521 first-line patients (53% male, median age 55 years) were included. Clarithromycin-amoxicillin triple therapy (Triple-CA, 53%) and bismuth-metronidazole-tetracycline quadruple therapy in single-capsule formulation (Pylera®, 43%) were predominant. A 10-day duration was prescribed in 59% and 94%, respectively, with both achieving 98% effectiveness. Compliance was high (100% *vs.* 95%), and adverse events were uncommon (0.4% *vs.* 2.2%). On multivariate analysis, 10-day duration and younger age were independently associated with higher eradication success. The most common indications were dyspepsia (61%) and peptic ulcer disease (18%); GC prevention accounted for 7.7%.

Conclusions: In Germany, empirical first-line *H. pylori* therapy achieves excellent effectiveness with optimized 10-day regimens. Comparable outcomes between Triple-CA and Pylera® may reflect low clarithromycin resistance. GC prevention represents a relevant indication in routine clinical practice.

Conflicts of Interest

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P03.11.

EFFECTIVENESS OF FIRST-LINE *HELICOBACTER PYLORI* TREATMENT IN EUROPE: REAL-WORLD EVIDENCE FROM A 13-YEAR ANALYSIS OF 68,361 PATIENTS FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Eradication regimens for *Helicobacter pylori* (*H. pylori*) infection have evolved over time in response to changes in antibiotic resistance patterns and clinical practice.

Materials and Methods*:* Prospective, non-interventional registry of the clinical practice of gastroenterologists in Europe between 2013-December 2025 at AEG-REDCap. Effectiveness was evaluated using modified intention-to-treat (mITT) analyses through multivariate logistic regression with 10,000 stratified bootstraps samples. Due to class imbalance (89% success/11% failure), model was retrained using ROSE oversampling.

Results: Overall, 68,361 treatments from 39 countries were analyzed: clarithromycin-amoxicillin/metronidazole triple therapy (triple-CA/M; 35%), bismuth-metronidazole-tetracycline quadruple therapy (single-capsule and traditional format, quad-sc/BMTc; 19%), clarithromycin-amoxicillin-tinidazole/metronidazole concomitant quadruple therapy (conco-CAT/M; 16%), clarithromycin-amoxicillin-bismuth quadruple therapy (quad-CAB; 13%), clarithromycin-amoxicillin-tinidazole/metronidazole sequential

quadruple therapy (seq-CAT/M; 5%), and others (11%). Quadruple regimens achieved >90% effectiveness but were associated with higher incidence of adverse events (20-25%) compared with triple (13%), which showed suboptimal effectiveness (<90%). The quad-sc/BMTc regimen was significantly more effective than triple-CA/M, as well as conco-CAT/M and quad-CAB (p<0.001, Table 1). Standard/high PPI doses, 10-14 days treatment length, >90% drug compliance, and probiotic use were associated with higher eradication rates (p<0.001).

Conclusions: The quad-sc/BMTc, conco-CAT/M, and quad-CAB achieved >90% effectiveness, but were associated with lower tolerability. The key determinants of eradication success were adequate adherence, standard/high PPI doses, and treatment durations of 10/14 days.

Conflict of Interest

Samuel J. Martínez-Domínguez*: None, Nuria Montes*: None, Enrique Ceamanos-Ibarra: None, Laimas Jonaitis: None, Ángeles Pérez-Aisa: None, Umud Mahmudov: None, Irina Voynovan: None, Bojan Tepes: None, Ludmila Vologzanina: None, Alfredo J. Lucendo: None, Juozas Kupcinskas: None, Gulustan Babayeva: None, Dmitry S. Bordin: None, Mónica Sánchez Alonso: None, Pablo Parra: None, Leticia Moreira: None, Francis Mégraud: None, Colm O´Morain: None, Olga P. Nyssen**: Consultant/Advisory Board: -, Javier P. Gisbert**, on behalf of the Hp-EuReg investigators. *Both first authors contributed equally to the study, **Both senior authors contributed equally to the study: None.

TABLE 1. Multivariable analysis models of effectiveness retrained using ROSE oversampling.

Dependent: mITT	Failure (N=30,707)	Success (N=50,541)	OR (95% CI, p-value)	
Treatment	**Triple-CA/M**	15,223 (49.6%)	17,818 (35.3%)	–
Seq-CAT/M	1,991 (6.5%)	2,969 (5.9%)	1.26 (1.15-1.38, p<0.001)	
Conco-CAT/M	6,012 (19.6%)	10,077 (19.9%)	2.02 (1.91-2.13, p<0.001)	
Quad-sc/BMTc	4,579 (14.9%)	11,886 (23.5%)	3.76 (3.53-4.01, p<0.001)	
Quad-CAB	2,902 (9.5%)	7,791 (15.4%)	2.12 (1.99-2.26, p<0.001)	
Age	**Mean ± SD**	50.1 ± 15.3	50.2 ± 15.2	1.00 (1.00-1.00, p<0.001)
Sex	**Female**	19,670 (64.1%)	29,614 (58.6%)	–
Male	11,037 (35.9%)	20,927 (41.4%)	1.20 (1.16-1.23, p<0.001)	
Treatment length	**7 days**	4,330 (14.1%)	3,662 (7.2%)	–
10 days	14,209 (46.3%)	23,278 (46.1%)	1.21 (1.13-1.29, p<0.001)	
14 days	12,168 (39.6%)	23,601 (46.7%)	1.52 (1.42-1.62, p<0.001)	
Dose PPI*	**Low**	16,206 (52.8%)	20,987 (41.5%)	–
Standard	7,086 (23.1%)	13,324 (26.4%)	1.40 (1.34-1.46, p<0.001)	
High	7,415 (24.1%)	16,230 (32.1%)	1.57 (1.51-1.64, p<0.001)	
Compliance	**No (< 90% drug intake)**	2,527 (8.2%)	425 (0.8%)	–
Yes (>90% drug intake)	28,180 (91.8%)	50,116 (99.2%)	14.50 (13.01-16.16, p<0.001)	
Probiotic use	**No**	25,657 (83.6%)	37,518 (74.2%)	–
Yes	5,050 (16.4%)	13,023 (25.8%)	1.46 (1.40-1.53, p<0.001)	

POSTER SESSION 04 - HELICOBACTER 4

P04.01.

RELEVANCE OF SEX ON *HELICOBACTER PYLORI* ERADICATION THERAPY: EXPERIENCE FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Some studies suggest that sex may influence *Helicobacter pylori* (*H. pylori*) treatment outcomes. However, large-scale evidence from real-world European clinical practice remains scarce.
Materials and Methods: Prospective, observational, non-interventional registry of the clinical practice of European gastroenterologists (Hp-EuReg, WorldHpReg partner). Data were collected using an e-CRF at AEG-REDCap (2013-June 2025). All empirical treatments were included. Effectiveness was assessed by modified intention-to-treat (mITT) analysis. Sex impact on effectiveness and adverse events (AEs) was analyzed using multivariate, regimen-stratified models.
Results: Overall, 84,081 patients were included (60% women; mean age 50 ± 18 years), with 84% receiving first-line therapy. Ulcer disease was a more frequent indication in men *vs.* women (23% *vs.* 13%, $p<0.001$). In women, 14-day regimens (47% *vs.* 49%, $p<0.001$), high-dose proton pump inhibitors (PPIs) (32% *vs.* 33%, $p<0.001$), and triple therapies (38% *vs.* 41%, $p<0.001$) were used less frequently, whereas quadruple therapies were more commonly prescribed (38% *vs.* 36%, $p<0.001$). First-line treatment effectiveness was significantly lower in women (89% *vs.* 91%, $p<0.001$), who also had a significantly higher risk of experiencing at least one AE (22% *vs.* 15%, $p<0.001$). Female sex was independently associated with lower adherence, reduced effectiveness, and a higher incidence rate of both overall and severe AEs (Table 1).
Conclusions: Female sex was associated with lower adherence to *H. pylori* eradication therapy, reduced treatment effectiveness, and a higher incidence and severity of AEs.

Conflicts of Interest
Diego Casas Deza: Research Grant: JR24/00033, Javier Alcedo: None, Laimas Jonaitis: None, Ángeles Pérez-Aísa: None, Bojan Tepes: None, Irina Voynovan: None, Umud Mahmudov: None, Samuel J. Martínez-Domínguez: None, Ludmila Vologzanina: None, Antonietta G. Gravina: None, Juozas Kupcinskas: None, Dmitry S. Bordin: None, Gülüstan Babayeva: None, Antonio Gasbarrini: None, Pablo Parra: None, Leticia Moreira: None, Olga P. Nyssen: None, Francis Mégraud: None, Colm O'Morain: None, Javier P. Gisbert: None.

TABLE 1. Adjusted odds ratios for the corresponding outcomes.

Regimen	Adherence	Effectiveness	Adverse events	Serious adverse events	Discontinuation due to adverse events	Severity of adverse events
All	0.83 (0.75-0.91)	0.64 (0.62-0.67)	1.56 (1.46-1.61)	2.44 (2.08-2.78)	1.79 (1.02-3.13)	2.22 (1.92-2.56)
Triple therapies	1.24 (1.06-1.45)	0.67 (0.62-0.72)	1.49 (1.39-1.61)	1.05 (0.37-2.99)	2.75 (1.99-3.79)	1.59 (1.23-2.06)
Quadruple therapies	0.60 (0.51-0.71)	0.68 (0.64-0.72)	1.47 (1.39-1.56)	0.66 (0.30-1.47)	1.99 (1.44-2.73)	1.54 (1.21-1.98)
Hybrid therapies	0.72 (0.44-1.2	1.25 (0.42-3.70)	0.84 (0.30-2.36)			
Single capsule* quadruple therapy	0.63 (0.49-0.81)	0.58 (0.53-0.64)	1.72 (1.92-2.38)	2.03 (0.45-9.16)	2.56 (1.64-3.97)	1.44 (1.01-2.06)

P04.03.

INFLUENCE OF ETHNICITY ON *HELICOBACTER PYLORI* ERADICATION THERAPY: RESULTS FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: *Helicobacter pylori* (*H. pylori)* infection remains a major global public health concern, with substantial geographical variability. Ethnicity may influence infection prevalence and treatment response.
Materials and Methods: This study assessed the impact of ethnicity on prescriptions, effectiveness, compliance, and safety of eradication therapies. Data were obtained from an ongoing international, prospective, non-interventional registry on the management of *H. pylori* infection (Hp-EuReg, World-HpReg partner). Data were recorded in the AEG-REDCap e-CRF (2013-January 2026). Treatment effectiveness was evaluated using a modified intention-to-treat analysis.
Results: Among 79,806 *H. pylori*-infected patients, 60% were female, 98% Caucasian, 0.8% Black, and 1.3% Asian, with a mean age of 51±20 years. Most were treatment-naïve (85%). Prescription patterns and effectiveness for empirical first-line and rescue regimens varied significantly across ethnic groups (Table 1). Concomitant quadruple therapy (clarithromycin-amoxicillin-metronidazole/tinidazole) and bismuth quadruple therapies with metronidazole-tetracycline (as single-capsule or classical formulation, Quadruple-sc/BMTc) and with clarithromycin-amoxicillin showed the highest first-line effectiveness. Quadruple-sc/BMTc and bismuth quadruple therapy with levofloxacin-amoxicillin were the most effective rescue regimens. Compliance exceeded 90% for both first-line and rescue regimens, without significant differences between ethnic groups. Adverse events occurred in 18% of Caucasians, 20% of Blacks, and 22% of Asians (p<0.01).
Conclusions: In Europe, significant differences across ethnic groups were observed in prescription, effectiveness, and tolerability of *H. pylori* eradication therapies, highlighting the need for tailored strategies considering ethnicity to optimize outcomes.

TABLE 1. Treatment use (%) and empirical first-line and rescue therapy effectiveness by modified intention-to-treat analysis.

First-line treatment	Caucasian N= 66,062		Black N = 520		Asian N = 830		*p*-value	
	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N(%)
Triple-CA/M	23,533 (35.6)	17,195 (87.5)	117 (22.5)	95 (85.6)	192 (23.1)	138 (82.6)	<0.001	0.144
Sequential-CAT-CAM	3,495 (5.3)	2,768 (90.3)	98 (18.8)	66 (80.5)	87 (10.5)	57 (75)		<0.001
Concomitant-CAT-CAM	10,637 (16.1)	9,267 (90.6)	97 (14.6)	79 (89.8)	70 (7)	58 (85.3)		0.319
Quadruple-sc/BMTc	12,831 (19.4)	11,403 (93.7)	124 (23.8)	99 (86.1)	109 (13.1)	96 (94.1)		0.004
Quadruple-CAB	7,716 (11.7)	6,485 (93.5	22 (4.2)	20 (90.9)	291 (35.1)	270 (97.1)		0.045
Other	7,850 (11.9)		62 (11.9)		81 (9.8)			
Overall mITT n (% success)	52,828 (90.2)		401 (85.3)		675 (88.2)		<0.001	
Rescue treatment	**Caucasian N= 12,063**		**Black N = 144**		**Asian N = 171**		***p*-value**	
	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N (%)	Prescriptions N (%)	mITT effectiveness Success N(%)
Triple-LA	2,495 (20.7)	1,744 (80)	23 (16)	13 (72.2)	18 (10.5)	12 (70.6)	<0.001	0.452
Concomitant-CAT-CAM	777 (6.4)	575 (77.9)	5 (3.5)	4 (80)	13 (7.6)	8 (66.7)		0.645
Quadruple-sc/BMTc	3,661 (30.3)	2,906 (86.3)	50 (34.7)	40 (93)	61 (35.7)	43 (75.4)		0.026
Quadruple-LAB	1,576 (13.1)	1,081 (83.9)	6 (4.2)	4 (80)	13 (7.6)	12 (92.3)		0.488
Other	3,554 (29.5)		60 (41.7)		66 (38.6)			
Overall mITT n (% success)	8,594 (80.5)		93 (73.2)		115 (72.8)		0.007	

mITT: modified intention-to-treat; C: clarithromycin; A: amoxicillin; M: metronidazole; T: tinidazole; sc: three-in-one single-capsule containing tetracycline, metronidazole and bismuth; B: bismuth; Tc: tetracycline; L: levofloxacin.

Conflicts of Interest
Javier Tejedor-Tejada: None, Samuel J. Martínez-Domínguez: None, Laimas Jonaitis: None, Ángeles Pérez-Aísa: None, Bojan Tepes: None, Irina N. Voynovan: None, Umud Mahmudov: None, Matteo Pavoni: None, Antonietta G. Gravina: None, Alfredo J. Lucendo: None, Juozas Kupcinskas: None, Dmitry S. Bordin: None, Gülüstan Babayeva: None, Antonio Gasbarrini: None, Pablo Parra: None, Leticia Moreira: None, Olga P. Nyssen: None, Francis Mégraud: None, Colm O'Morain: Consultant/Advisory Board: No, Javier P. Gisbert, on behalf of the Hp-EuReg investigators. Javier Tejedor-Tejada and Samuel J. Martínez-Domínguez, both first authors, contributed equally to the study: None.

P04.05.

TEMPORAL PATTERNS AND INTER-CENTER VARIABILITY IN FIRST-LINE EMPIRICAL ERADICATION THERAPY FOR *HELICOBACTER PYLORI* INFECTION IN EUROPE: ANALYSIS OF THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: The choice of first-line eradication therapy for *Helicobacter pylori* (*H. pylori*) has evolved in recent years following updates in European clinical guidelines. Our aim was to evaluate temporal changes and inter-center variability in prescribing patterns across Europe.
Patients and Methods: Prospective, multicenter observational study based on the European Registry on

H. pylori Management (Hp-EuReg, WorldHpReg partner). Adult treatment-naïve patients receiving empirical first-line therapy were collected at AEG-REDCap between 2013-January 2025. Cases not receiving predefined regimens were excluded. Centers contributing ≥30 patients in both periods (2013-2019 and 2020-2025) were selected. Effectiveness was assessed by modified intention-to-treat analysis.

Results: Overall, 46,259 patients from 71 centers were included. Baseline characteristics were comparable between periods. Triple therapy with clarithromycin-amoxicillin (Triple-CA) was most frequently used (26%), followed by single-capsule bismuth quadruple therapy with metronidazole-tetracycline (17%), and concomitant therapy with clarithromycin-amoxicillin-metronidazole (14%). Significant changes were observed between periods (p<0.001), with a decrease in Triple-CA (37% *vs.* 24%) and an increase in bismuth quadruple therapies (BQT) (15% *vs.* 28%). Standard-dose proton pump inhibitor use (24% *vs.* 29%) and treatment duration (10 *vs.* 14 days) increased (p<0.001). Eradication rates improved (88% *vs.* 91%; p<0.001) as did adherence (97% *vs.* 98%; p<0.001). At center level, in 2013-2019, Triple-CA predominated in 34% of centers, whereas, in 2020-2025, BQT predominated in 48%.
Conclusions: Management of *H. pylori* infection in Europe has shifted towards more effective regimen, longer treatments and optimized acid suppression. However, substantial inter-center variability persists, suggesting heterogeneous implementation of clinical guidelines.

Conflicts of Interest
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POSTER SESSION 07 - HELICOBACTER 5

P07.03.

EFFECTIVENESS OF REUSE OF HELICOBACTER PYLORI ERADICATION THERAPIES AFTER PRIOR FAILURE: RESULTS FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Patients and Methods: A multicenter, prospective, non-interventional European registry (Hp-EuReg, WorldHpReg partner) was used to evaluate clinical practice and outcomes of *H. pylori* management by European gastroenterologists. Patients treated between 2013-2025 who received 2nd–6th line empirical therapy after ≥1 failure and with reuse of the same regimen were included. Regimens with ≥30 cases were analyzed. Effectiveness was evaluated by modified intention-to-treat analysis.

Results: Of 13,280 patients with prior failure, 628 (5%) were retreated with the same regimen. The most commonly reused therapies were triple therapy with amoxicillin-clarithromycin (Triple-CA), quadruple concomitant therapy with clarithromycin-amoxicillin-metronidazole (Conco-CAM), and bismuth-containing quadruple therapies with clarithromycin-amoxicillin (Quad-CAB) and metronidazole-tetracycline, either as a single-capsule formulation (Pylera®) or a classical formulation (Quad-MTcB). All regimens included a proton pump inhibitor. Treatment duration was the only factor influencing effectiveness, with longer treatments associated with better outcomes. Table 1 presents the effectiveness of each regimen by treatment line, and in 2nd line, by treatment length.

TABLE 1. Eradication rate by treatment line.

Scheme	2nd line	3rd line	4th line	5th line	6th line
Triple-CA	61%	48%	33%*	20%*	0%**
Conco-CAM	81%	71%	50%*	-	-
Quad-CAB	86%	100%**	-	100%**	-
Quad-MTcB	86%	57%*	67%**	100%**	0%**
Single-capsule	90%	72%	80%	50%**	100%*

* <10 patients per group; ** < 5 patients per group

Eradication rate by 2nd line treatment and length.

Scheme	7 days	10 days	14 days	*p*-value and OR (95% CI)
Triple-CA	37%	70%	65%	10 days: *p*=0.012, 3.85 (1.34-11.01) 14 days: *p*=0.025, 3.15 (1.15-8.60)
Conco-CAM	-	67%	83%	14 days: *p*=0.497
Quad-CAB	43%	96%	90%	10 days: *p*=0.996 14 days: *p*=0.997
Quad-MTcB	-	0%	92%	14 days: *p*=0.011, OR NA
Single-capsule	-	90%	100%	14 days: p=0.739

Triple-CA: triple therapy with amoxicillin-clarithromycin; Conco-CAM: quadruple concomitant therapy with clarithromycin-amoxicillin-metronidazole; Quad-CAB: bismuth-containing quadruple therapy with clarithromycin-amoxicillin; Quad-MTcB: bismuth-containing quadruple therapy with metronidazole-tetracycline; Single-capsule: Pylera®; OR: odds ratio; NA: not available due to sample size.

Conclusions: In real-world practice, the reuse of bismuth-containing quadruple therapies in 2nd line therapy achieves high eradication rates, particularly with 10-14-day regimens. Empirical reuse of some treatments may be considered when alternatives are limited.

Conflicts of Interest

Elisa Cantú-Germano: None, Leticia Moreira: Speakers Bureau/Honoraria: Juvisé, Laimas Jonaitis: None, Ángeles Pérez-Aísa: None, Bojan Tepes: None, Umud Mahmudov: None, Samuel J. Martínez-Domínguez: None, Javier Tejedor-Tejada: None, Alfredo J. Lucendo: None, Sayar R. Abdulkhakov: None, Juozas Kupcinskas: None, Mārcis Leja: None, Gülüstan Babayeva: None, Dmitry S. Bordin: None, Mónica Sánchez Alonso: None, Pablo Parra: None, Francis Mégraud: None, Colm O'Morain: Other Research Support: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón; Speakers Bureau/Honoraria: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón, Javier P. Gisbert: Other Research Support: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón; Speakers Bureau/Honoraria: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón; Consultant/Advisory Board: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón, Olga P. Nyssen: Other Research Support: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón.; Speakers Bureau/Honoraria: Mayoly, Allergan/Abbvie, Diasorin, Richen, Juvisé, Biocodex and Zambón.

P07.08.

EMPIRICAL SECOND-LINE TREATMENT IN EUROPE: DATA FROM 10,000 CASES FROM THE EUROPEAN REGISTRY ON *HELICOBACTER PYLORI* MANAGEMENT (HP-EUREG)

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Objective: After a first eradication attempt, a relevant proportion of patients fail to eradicate *Helicobacter pylori* (*H. pylori*). We aimed to evaluate second-line empirical treatment effectiveness.
Materials and Methods: A systematic, prospective registry of European gastroenterologists' clinical practice in *H. pylori* management was established (Hp-EuReg, a WorldHpReg partner). Infected adults were registered at AEG-REDCap e-CRF between January 2013 and January 2026. Modified intention-to-treat (mITT) and per-protocol (PP) analyses were performed.
Results: Overall, 10,350 patients received second-line empirical therapy. Overall effectiveness was 82% (mITT) and 83% (PP), with 97% compliance. Adverse events occurred in 19% of cases, mostly mild. Effectiveness of the most frequent empirical second-line treatments is shown in Table 1. Under optimized conditions (14-day duration and high-dose proton pump inhibitors), no therapy exceeded 90% effectiveness. After failure of first-line clarithromycin-containing therapy, triple therapy with amoxicillin-rifabutin/levofloxacin achieved 84% and 81%, respectively. Bismuth quadruple therapy with tetracycline-metronidazole (single-capsule or classical), clarithromycin-amoxicillin and levofloxacin-amoxicillin achieved 88%, 86%, 88% and 86%, respectively. In this subgroup under optimized conditions, concomitant therapy with amoxicillin-clarithromycin-metronidazole reached 90%, while bismuth quadruple therapy with tetracycline-metronidazole (classical) achieved 94% and with levofloxacin-amoxicillin 90%. After failure of bismuth quadruple therapy (classical or single-capsule), bismuth quadruple therapy with clarithromycin-amoxicillin achieved 95%, whereas the single-capsule regimen achieved 86%.
Conclusions: In Europe, overall empirical second-line treatment effectiveness is suboptimal. Findings highlight the need for improved treatment strategies and support optimized approaches after first-line failure.

TABLE 1. Second-line empirical treatment prescriptions and effectiveness by treatment scheme and geographical region.

Treatment	N	Use (%)	mITT, N (%)	(95% CI)	PP, N (%)	(95% CI)
Single-capsule*	2,427	24	2,217 (88)	(86-89)	2,167 (88)	(87-90)
Triple-A+L	2,229	22	1,971 (80)	(78-82)	1,947 (80)	(78-82)
Quadruple-A+L+B	1,393	14	1,123 (86)	(84-88)	1,099 (86)	(84-88)
Quadruple-C+A+M	630	6.2	599 (82)	(79-85)	585 (83)	(79-86)
Quadruple-M+Tc+B	600	5.9	535 (85)	(82-88)	514 (86)	(83-89)
Triple-C+A	514	5.1	421 (74)	(70-78)	415 (74)	(70-79)
Quadruple-C+A+B	413	4	289 (89)	(86-93)	279 (90)	(86-94)
Triple-A+R	273	2.7	247 (83)	(78-88)	245 (83)	(80-88)
Triple-A+M	221	2.2	196 (59)	(52-66)	195 (59)	(52-66)
Other	1,460	14	NA	NA	NA	NA
Overall	10,160	100	8,864 (82)	(82-83)	8,689 (83)	(82-84)
Overall (optimized conditions)	2,227	22	1,907 (87)	(85-88)	1,866 (87)	(86-89)
East	1,610	16	1,333 (84)	(82-86)	1,293 (85)	(83-87)
East-Centre	1,901	18	1,366 (85)	(83-87)	1,349 (85)	(84-87)
South-West	4,462	43	4,182 (82)	(81-83)	4,095 (82)	(81-84)
West-Centre	1,669	16	1,512 (85)	(83-87)	1,489 (85)	(83-87)
North	708	6.8	634 (69)	(65-72)	615 (70)	(66-74)
Total	10,350	100	9,027 (82)	(81-83)	8,841 (83)	(82-83)

95% CI –confidence interval; mITT: modified intention-to-treat; PP: per-protocol, N: total number of patients analysed; C – clarithromy-cin; M – metronidazole; A – amoxicillin; L – levofloxacin; B – bismuth salts; Tc – tetracycline; R – rifabutin; Other – Other second-line em-pirical treatments with less than 150 patients treated in each category; East – Ukraine, Serbia, Bulgaria, Turkey, Russia, Romania, Albania, North Macedonia, Bosnia and Herzegovina, Kosovo, Moldova, Montenegro; East-Centre – Croatia, Poland, Hungary, Latvia, Lithuania, Greece, Slovenia, Czech Rep, Azerbaijan, Slovakia, Malta, Armenia, Georgia, Estonia; South-West – Portugal, Spain; West-Centre – France, Austria, Belgium, Germany, Italy; North – The United Kingdom, Finland, The Netherlands, Ireland, Israel, Norway, Switzerland, Sweden, Denmark; *three-in-one single-capsule containing tetracycline, metronidazole and bismuth.

Conflicts of Interest

Pablo Parra: None, Laimas Jonaitis: None, Ángeles Pérez-Aísa: None, Samuel J. Martínez-Domínguez: None, Bojan Tepes: None, Matteo Pavoni: None, Giuseppe Losurdo: None, Ludmila G. Vologzanina: None, Irina N. Voynovan: None, Javier Tejedor-Tejada: None, Alfredo J. Lucendo: None, Juozas Kup-cinskas: None, Antonio Gasbarrini: None, Dmitry S. Bordin: None, Mónica Sánchez Alonso: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: None, Olga P. Nyssen*: Consultant/Advisory Board: -, Javier P. Gisbert*, on behalf of the Hp-EuReg investigators. *Both senior authors contributed equally to the study.: Employment (full or part-time): Full; Research Grant: -

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P08.02.

SAFETY OF *HELICOBACTER PYLORI* ERADICATION THERAPIES: AN ANALYSIS OF 59,000 PATIENTS FROM THE EUROPEAN REGISTRY ON H. PYLORI MANAGEMENT (HP-EUREG)

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Objective: *Helicobacter pylori* (*H. pylori*) infection causes peptic ulcer disease and gastric cancer. While eradication treatment effectiveness is well established, real-world data on adverse events (AEs) and their impact on adherence remain limited.

Patients and Methods: We aimed to evaluate AEs frequency, type, intensity, and duration, and their influence on adherence, across commonly prescribed regimens. A multicenter, prospective registry evaluating *H. pylori* management by European gastroenterologists (Hp-EuReg, WorldHpReg partner). Data were registered at AEG-REDCap e-CRF between January 2013 and January 2026. Patients with at least one AE recorded were included. Patients receiving pro/prebiotics were excluded. Analyses were restricted to regimens prescribed in more than 100 patients.

Results: Overall, 58,911 patients from 38 European countries were analyzed (mean age 50 years, 60% female). At least one AE occurred in 18% of cases. Diarrhea (6%), nausea (5.6%), dysgeusia (4.9%), and abdominal pain (3.3%) were the most frequent. Most AEs were mild (58%), moderate (34%), and severe (7.6%). The duration was most commonly seven days. Among patients with AEs, 7.8% discontinued treatment, while 0.5% developed a serious AE. The highest incidence of AEs occurred with amoxicillin-metronidazole triple therapy (33%), and the lowest with clarithromycin-levofloxacin triple therapy

and clarithromycin-metronidazole-bismuth quadruple therapy (11% each). Compliance was 97%, with all regimens above 90%. Table 1 shows AEs incidence and compliance by therapy.
Conclusions: AEs during *H. pylori* eradication therapy, although frequent, are generally mild, transient, and do not affect adherence.

Conflicts of Interest
Pablo Parra: None, Ángeles Pérez-Aísa: None, Bojan Tepes: None, Laimas Jonaitis: None, Umud Mahmudov: None, Samuel J. Martínez-Domínguez: None, Irina N. Voynovan: None, Luis Bujanda: None, Alfredo J. Lucendo: None, Javier Tejedor-Tejada: None, Juozas Kupcinskas: None, Gülüstan Babayeva: None, Dmitry S. Bordin: None, Irene Arteagoitia: None, Mónica Sánchez Alonso: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: None, Olga P. Nyssen*: Consultant/Advisory Board: -, Javier P. Gisbert*, on behalf of the Hp-EuReg investigators. *Both senior authors contributed equally to the study.: Employment (full or part-time): Full; Research Grant: -

TABLE 1. Treatment safety and compliance according to the eradication therapy.

	Adverse events, N (%; 95% CI) **	Compliance, N (%; 95% CI) **
Dual-A	470 (13; 9.5-16)	469 (99; 98-100)
Triple-ML	107 (16; 8.5-23)	107 (97; 92-99)
Triple-CM	2,205 (13; 12-14)	2,192 (98; 97-98)
Triple-CL	202 (11; 6.3-15)	201 (97; 94-100)
Triple-CA	17,430 (12; 11-12)	17,202 (97; 97-97)
Triple-AM	1,311 (33; 30-35)	1,297 (97; 96-98)
Triple-AR	207 (18; 13-24)	206 (94; 91-98)
Triple-AL	2,624 (13; 12-15)	2,600 (97; 96-97)
Single-capsule*	11,659 (19; 18-20)	11,623 (97; 97-98)
Sequential-CAT	417 (15; 11-18)	416 (95; 93-98)
Sequential-CAM	517 (13; 9.6-16)	514 (99; 98-100)
Hybrid-CAM	197 (29; 23-36)	197 (99; 96-100)
Quadruple-MTcB	1,672 (25; 23-27)	1,623 (96; 95-97)
Quadruple-MDB	454 (18; 15-22)	449 (96; 94-98)
Quadruple-CMB	236 (11; 7.2-16)	236 (98; 95-99)
Quadruple-CAT	349 (22; 18-27)	348 (94; 91-96)
Quadruple-CAM	9,433 (22; 21-22)	9,402 (97; 97-98)
Quadruple-CAB	6,361 (26; 25-27)	6,354 (98; 98-99)
Quadruple-AMB	1,032 (25; 22-28)	1,022 (99; 98-99)
Quadruple-ALB	1,536 (21; 19-23)	1,530 (97; 96-98)
Quadruple-ABJ	492 (28; 24-33)	492 (97; 96-99)
Total	58,911 (18; 18-18)	58,480 (97; 97-97)

A: amoxicillin; B: bismuth; C: clarithromycin; D: doxycycline; J: josamycin; L: levofloxacin; M: metronidazole; R: rifabutin; T: tinidazole; Tc: tetracycline; *three-in-one single-capsule containing tetracycline, metronidazole and bismuth; **Statistically significant differences (p<0.05) between the analyzed therapies.

P08.03.

HELICOBACTER PYLORI LARGE LANGUAGE MODELS BENCHMARK AND FINE-TUNING USING INFORMATION FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: This study aimed to develop a specialized language model capable of answering complex, domain-specific questions on *Helicobacter pylori* (*H. pylori*) using data from the European Registry on *H. pylori* Management (Hp-EuReg, WorldHpReg partner), with the goal of improving access to structured clinical knowledge through AI tools.
Materials and Methods*:* Up to 50 Hp-EuReg scientific publications were analyzed. Text was extracted using an automated PDF processing pipeline and manually reviewed to ensure accuracy. After data cleaning, approximately 500 high-quality question-answer pairs were generated. A web-based platform enabled Hp-EuReg gastroenterologists to validate the dataset. This curated corpus was used to fine-tune three compact models: Llama 3.1 8B, Phi-4 4B, and MedGemma3 4B. Performance was assessed using an automated benchmark of 114 expert-designed multiple-choice questions and compared with leading large language models, including GPT-5 mini, GPT-4o, and o4-mini.
Results: Benchmark results showed that GPT-5 mini, GPT-4o, and GPT-4.1 achieved the highest accuracy (92%), followed by o4-mini (88%). Among compact models, MedGemma3 4B reached 72%, Llama 3.1 8B 71%, and Phi-4 improved from 56% to 67% after fine-tuning. Large models showed strong reasoning capacity and extensive embedded medical knowledge. Fine-tuning provided limited gains for MedGemma3 but significantly improved performance in the general-purpose Phi-4 model.
Conclusions: Fine-tuning with a curated, domain-specific dataset enhances the performance of compact models in *H. pylori*-related tasks, particularly for general-purpose architectures such as Phi-4. Future work will focus on expanding the dataset and developing a Retrieval-Augmented Generation (RAG) chatbot integrating national guidelines to support personalized, region-specific clinical decision-making.

Conflicts of Interest
Antonello Scalmato*: None, Olga P. Nyssen*: None, Carola Motolese: None, Riccardo Gjini: None, Samuel J. Martínez-Domínguez: None, Pablo Parra: None, Leticia Moreira: None, Tania Fleitas Kanonnikoff**: Consultant/Advisory Board: -, Javier P. Gisbert**, on behalf of the AIDA Consortium. *Both first authors contributed equally to the study, **Both senior authors contributed equally to the study: None.

P08.12.

EFFECTIVENESS AND SAFETY OF SINGLE-CAPSULE BISMUTH QUADRUPLE THERAPY IN 16,000 PATIENTS FROM THE EUROPEAN REGISTRY ON *HELICOBACTER PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Three-in-one single-capsule bismuth quadruple therapy (proton pump inhibitor [PPI]-bismuth-tetracycline-metronidazole) is widely used in Europe for eradicating *Helicobacter pylori* (*H. pylori*) infection, although real-world evidence requires evaluation.

Patients and Methods: We assessed the effectiveness and safety of single-capsule (Pylera®) therapy for *H. pylori* eradication. Data from the European Registry on *H. pylori* Management (Hp-EuReg, World-HpReg partner) were analyzed (AEG-REDCap, 2013-January 2026). Adults treated with the 10-day single-capsule regimen, 3 capsules q.i.d. (standard) or 4 t.i.d. (alternative), were included. Effectiveness was evaluated using modified intention-to-treat analysis.

Results: Among 90,264 patients, 15,800 (17%) received single-capsule therapy. Most were treat-ment-naïve (79%). Overall effectiveness was 92% with the standard regimen and 94% with the alterna-tive (p<0.001). First-line eradication reached 94%, decreasing to 88% in second-line, and 84% in rescue therapy. Optimized regimens in rescue settings did not achieve ≥90% effectiveness. Compliance was high (97%) and strongly associated with success (OR: 8.1; 95% CI: 6.2-10.5). Standard- (OR: 1.4; 1.2-1.6) and high-dose PPIs (OR: 1.5; 1.2-1.7) improved effectiveness, whereas rescue therapy (OR: 0.3; 0.3-0.4) was associated with lower eradication rates. Adverse events occurred in 22% of patients, were generally mild, and led to treatment discontinuation in 1.8%; serious events were rare (0.1%).

Conclusions: Single-capsule bismuth quadruple therapy achieves high first-line effectiveness with a favorable safety profile. Effectiveness declines in rescue settings but improves with adherence and adequate acid suppression.

TABLE 1. Three-in-one single-capsule effectiveness, compliance and safety in first line and rescue treatment lines.

	Use, N (%)	mITT, N (%)	95% CI	PP, N (%)	95% CI	Compliance, N (%)	95% CI	AEs, N (%)	95% CI
Overall	15,800 (17*)	13,797 (92)	(91-92)	13,630 (93)	(92-93)	15,393 (97%)	(97-97)	15,372 (21.5%)	(20-23)
1st line (naïve)	12,493 (79)	9,449 (93)	(93-94)	9,299 (94)	(93-94)	11,896 (97%)	(97-98)	12,213 (21%)	(20-22)
2nd line	2,427 (15)	1,721 (87)	(85-89)	1,684 (88)	(86-89)	2,314 (96%)	(95-97)	2,307 (23%)	(21-25)
3rd to 6th line	879 (5.6)	662 (83)	(80-86)	643 (84)	(81-87)	858 (94%)	(94-96)	852 (30%)	(26-33)

*Of the total of treatments included in the Hp-EuReg up to January 2026 (i.e., N= 90,264); mITT: modified intention-to-treat; PP: per-protocol; N: total number of patients analysed; CI: confidence interval; AEs: adverse events.

Conflicts of Interest

Olga P. Nyssen: None, Ángeles Pérez-Aísa: None, Javier Tejedor-Tejada: None, Antonietta G. Gravina: None, Samuel J. Martínez-Domínguez: None, Alfredo J. Lucendo: None, Monica Perona: None, Antonio Gasbarrini: None, María Soledad Marcos: None, Blas José Gómez Rodríguez: None, Giuseppe Losurdo: None, Óscar Núñez: None, Antonio Moreno Loro: None, Mónica Sánchez Alonso: None, Virginia Flores: None, Pablo Parra: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: None, Javier P. Gisbert: None.

POSTER SESSION 09 - HELICOBACTER 7

P09.02.

DIAGNOSTIC APPROACHES FOR *HELICOBACTER PYLORI* IN EUROPE: INSIGHTS FROM OVER 80,000 PATIENTS IN THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Multiple diagnostic methods are available for detecting *Helicobacter pylori* (*H. pylori*) infection, classified as invasive or non-invasive. Test selection depends on clinical context, including age and alarm symptoms. The aim of the study is to analyze real-world clinical practices in *H. pylori* testing, evaluating invasive and non-invasive methods used for initial diagnosis and post-treatment confirmation.
Patients and Methods: We analyzed data from a multicenter, prospective registry evaluating *H. pylori* management by European gastroenterologists (Hp-EuReg, WorldHpReg partner). Data were registered at AEG-REDCap e-CRF from January 2013 to January 2026. Only patients with validated diagnostic and eradication confirmation methods were analyzed.
Results: Overall, 81,360 patients (mean age 50±15 years; 60% female) from 41 European countries were included. In treatment-naïve patients (n=68,808), non-invasive tests alone were used in 31%, invasive in 60%, and both in 9%. Histology and rapid urease test (37% each) were most frequent, followed by the ^{13}C-urea breath test (24%). Invasive testing was more common in patients >50 years (63% *vs.* 56%). The distribution of diagnostic tests in treatment-naïve patients across countries is shown in Table 1. For eradication confirmation (regardless of the treatment line), non-invasive tests were used in 91%, invasive in 7.5%, and both in 1.9%. The

^{13}C-urea breath test (63%) and the monoclonal stool antigen test (24%) were the most used.
Conclusions: *H. pylori* testing shows variability across Europe and suboptimal adherence to non-invasive recommendations, highlighting the need to improve guideline implementation.

Conflicts of Interest
Pablo Parra*: None, Olga P. Nyssen*: None, Ángeles Pérez-Aísa: None, Irina N. Voynovan: None, Bojan Tepes: None, Umud Mahmudov: None, Laimas Jonaitis: None, Samuel J. Martínez-Domínguez: None, Alfredo J. Lucendo: None, Javier Tejedor-Tejada: None, Luis Bujanda: None, Dmitry S. Bordin: None, Gülüstan Babayeva: None, Juozas Kupcinskas: None, Mónica Sánchez Alonso: None, Irene Arteagoitia: None, Leticia Moreira: None, Francis Mégraud: None, Colm O'Morain: Consultant/Advisory Board: -, Javier P. Gisbert, on behalf of the Hp-EuReg investigators. *Both first authors contributed equally to the study.: Employment (full or part-time): Full; Research Grant: -

TABLE 1. The test used to establish the initial diagnosis of *H. pylori* infection in treatment-naïve patients per country.

	Non-invasive test	13C-urea breath test	14C-urea breath test	Serology	Monoclonal stool antigen test	Polyclonal stool antigen test	Urea Breath Test Helik	Stool PCR test	Invasive test	Histology	Rapid urease test	Culture	Biochemical resistance test (antigens, FISH)	Gastric tissue PCR test	Non-invasive test + Invasive test
Albania (n=139)	48.9%	2.2%	2.2%	1.4%	29.5%	13.7%	0%	0%	51.1%	50.4%	0.7%	0%	0%	0%	0%
Armenia (n=25)	0%	4%	0%	0%	0%	0%	0%	0%	96%	0%	100%	0%	0%	0%	4%
Austria (n=442)	5.7%	1.6%	0%	1.4%	2.7%	0.5%	0%	0%	93.9%	88.9%	4.5%	0.9%	0.7%	0%	0.5%
Azerbaijan (n=7,005)	1.3%	0%	0%	0.1%	1.1%	0.1%	0.1%	0%	98.7%	0.3%	98.5%	0%	0%	0%	0.1%
Belgium (n=108)	2.8%	3.7%	0%	2.8%	0.9%	0%	0%	0%	93.5%	96.3%	0%	35.2%	0%	0%	3.7%
Bosnia & Herzegovina (n=91)	57.1%	2.2%	1.1%	15.4%	27.5%	18.7%	0%	1.1%	36.3%	5.5%	38.5%	0%	0%	1.1%	6.6%
Bulgaria (n=172)	18%	4.7%	3.5%	1.2%	14.5%	0.6%	0%	0%	77.9%	23.3%	27.3%	50%	2.3%	0%	4.1%
Croatia (n=752)	16%	0.3%	0%	0%	16.2%	0.1%	0.1%	0%	83.2%	50.1%	27.8%	7.2%	0%	0%	0.8%
Czech Republic (n=940)	7.7%	0.9%	0.1%	0.1%	4.5%	2.8%	0.1%	0%	91.6%	63.3%	37%	4.6%	0%	0%	0.7%
Denmark (n=21)	19%	14.3%	0%	0%	4.8%	0%	0%	0%	81%	19%	61.9%	0%	0%	0%	0%
Estonia (n=1)	0%	0%	0%	0%	0%	0%	0%	0%	100%	100%	0%	0%	0%	0%	0%
Finland (n=6)	0%	0%	0%	0%	16.7%	0%	0%	0%	83.3%	83.3%	0%	100%	0%	0%	16.7%
France (n=212)	5.7%	6.6%	0.5%	3.3%	0%	0%	0%	0%	90.1%	93.4%	0.5%	10.4%	2.4%	4.2%	4.2%
Georgia (n=263)	30.8%	1.9%	0%	1.1%	27.4%	0%	3.8%	0%	66.5%	59.7%	14.1%	0%	0%	0%	2.7%
Germany (n=498)	7.6%	6%	0%	2.8%	4%	0.6%	0%	0%	88.8%	88.6%	18.5%	4%	0%	0%	3.6%
Greece (n=846)	6.1%	7.6%	0%	1.3%	0.2%	0.4%	0%	0%	90.5%	45%	64.1%	32.3%	0.2%	0%	3.3%
Hungary (n=375)	23.2%	22.7%	1.3%	20.5%	6.7%	0.3%	0%	0%	50.4%	68.5%	34.1%	0.5%	29.1%	0%	26.4%
Ireland (n=1,408)	33.8%	33.7%	0%	3.2%	0.3%	0.1%	0.1%	0%	65.8%	37.5%	44.2%	2.3%	0.1%	0%	0.4%

Continued

TABLE 1 *(Continued)*. The test used to establish the initial diagnosis of *H. pylori* infection in treatment-naïve patients per country.

	Non-invasive test	13C-urea breath test	14C-urea breath test	Serology	Mono-clonal stool antigen test	Polyclonal stool antigen test	Urea Breath Test Helik	Stool PCR test	Invasive test	Histology	Rapid urease test	Culture	Bioche-mical resistance test (antigens, FISH)	Gastric tissue PCR test	Non-invasive test + Invasive test
Israel (n=233)	32.2%	26.2%	1.7%	0.4%	5.6%	1.7%	0%	0%	65.7%	49.4%	19.3%	0.9%	0%	0%	2.1%
Italy (n=4,571)	15.9%	79.5%	0.2%	0.2%	3.5%	0.9%	0.1%	1.8%	16.3%	83.2%	65.4%	63.3%	1.7%	0%	67.8%
Kosovo (n=62)	58.1%	1.6%	0%	16.1%	41.9%	0%	0%	0%	41.9%	4.8%	37.1%	0%	0%	0%	0%
Latvia (n=951)	16.6%	9.4%	0%	8.5%	0.1%	0%	0%	0%	82.1%	45.1%	39.5%	0%	0%	0%	1.3%
Lithuania (n=1,932)	34.3%	2.9%	0.4%	27.6%	3.2%	1.3%	0.1%	0%	64.9%	26%	40.1%	0.1%	0%	0%	0.8%
Malta (n=99)	0%	0%	0%	0%	0%	0%	0%	0%	100%	2%	98%	0%	0%	0%	0%
Moldova (n=308)	40.6%	0.6%	0%	2.3%	39.6%	0%	0%	0.3%	57.8%	1.9%	57.8%	0%	0%	0%	1.6%
Montenegro (n=17)	41.2%	0%	0%	0%	41.2%	0%	0%	0%	58.8%	58.8%	0%	0%	0%	0%	0%
Netherlands) (n=125)	21.6%	18.4%	0%	4.8%	1.6%	0%	0%	0%	75.2%	69.6%	6.4%	4%	0%	0%	3.2%
North Macedonia (n=256)	100%	88.7%	0%	10.9%	0.4%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%
Norway (n=1,293)	20%	1.9%	0%	28.2%	4.5%	0.2%	0.2%	0%	66.7%	9.3%	21.1%	56.9%	0%	0%	13.3%
Poland (n=623)	23.6%	3.5%	0%	1.8%	6.1%	3.9%	9.8%	0%	75.6%	15.2%	69.3%	0.2%	0%	0%	0.8%
Portugal (n=843)	7.4%	0.7%	4.5%	2.3%	0%	0%	0.1%	0%	92.4%	92.6%	0.1%	0.1%	0%	0%	0.2%
Romania (n=82)	18.3%	3.7%	0%	12.2%	3.7%	0%	0%	0%	81.7%	70.7%	28%	0%	0%	0%	0%
Russia (n=12,915)	47%	34.4%	0.1%	19.1%	9.8%	1.5%	1.5%	0.9%	36.9%	23.5%	32%	0.9%	0.9%	0.9%	16.1%
Serbia (n=974)	34.1%	2.4%	0.2%	3.3%	28.2%	1.6%	0.2%	0.2%	64%	23.5%	42.1%	0.1%	2.4%	6%	2%
Slovakia (n=21)	0%	0%	0%	0%	0%	0%	0%	0%	100%	100%	4.8%	14.3%	0%	0%	0%
Slovenia (n=4,011)	10.2%	13.5%	0.1%	2.8%	1.6%	0.1%	0%	0%	84.5%	27.2%	72.7%	5.5%	0%	0%	5.2%
Spain (n=24,135)	43.7%	26.2%	0.5%	1%	16.6%	1.5%	0.1%	0%	54.9%	43.7%	13.1%	3%	0%	0.1%	1.4%
Switzerland (n=445)	5.6%	3.6%	0%	0.2%	2.2%	0%	0%	0.2%	93.7%	80%	66.3%	0.2%	0%	0%	0.7%
Turkey (n=467)	12.8%	0.2%	5.4%	0.9%	6.9%	0%	0%	0%	86.7%	55.7	32.3%	0%	0%	0%	0.4%
United Kingdom (n=509)	48.7%	1.2%	0.8%	18.9%	30.6%	0.8%	0%	0%	48.9%	27.7%	26.3%	0.4%	0%	0%	2.4%
Ukraine (n=632)	29.3%	3.5%	0%	18.4%	6%	0.3%	2.7%	0.3%	68.8%	60.1%	11.1%	0.2%	0%	0%	1.9%
Total (n=68,808)	31.4%	23.6%	0.3%	6.3%	9.9%	1.1%	0.5%	0.3%	59.5%	37.3%	37.1%	7.7%	0.5%	0.3%	9%

P09.05.

REAL-WORLD EFFICACY AND SAFETY OF ADDING REBAMIPIDE TO FIRST-LINE *HELICOBACTER PYLORI* ERADICATION THERAPY: RESULTS FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: Rebamipide is a gastroprotective agent widely used in Japan, South Korea, and Russia. Meta-analyses of randomized controlled trials indicate that adding rebamipide to *Helicobacter pylori* (*H. pylori*) eradication therapy improves treatment effectiveness; however, large-scale real-world data are lacking. This study evaluates the effectiveness and safety of first-line empirical therapy with rebamipide added to eradication regimens in Russia.

Patients and Methods: Data from treatment-naïve patients were collected at AEG-REDCap (from January 2020 to August 2024) in Russian centers participating in the European Registry on *H. pylori* Management (Hp-EuReg, WorldHpReg partner), an international, prospective, multicenter, observational study. Rebamipide-containing regimens were analyzed and compared with those without rebamipide. Effectiveness was assessed using a modified intention-to-treat approach.

Results: Overall, 4,581 patients (mean age 48±15 years, 64% women) were included: 820 received rebamipide and 3,761 did not. Overall effectiveness was higher with rebamipide (96% [731/763] *vs.* 91% [2,785/3,059]; $p<0.001$). Adding rebamipide to proton pump inhibitor (PPI)-clarithromycin-amoxicillin triple therapy (Triple-CA) improved effectiveness to 93% ($p<0.001$) and adding to PPI-clarithromycin-amoxicillin-bismuth quadruple therapy (Quad-CAB) to 97% ($p<0.05$), compared with 79% and 95% without rebamipide, respectively. Multivariate analysis confirmed the added benefit of rebamipide in these regimens. Adverse events were more frequent with rebamipide (46% *vs.* 29%, $p<0.0001$), mainly dyspepsia and nausea; none were serious or caused discontinuation. Compliance was similar (99% *vs.* 98.5%, $p>0.05$).

Conclusions: In real-world Russian clinical practice, adding rebamipide to Triple-CA or Quad-CAB significantly improved *H. pylori* eradication rates but increased adverse events, predominantly dyspepsia and nausea; however, compliance remained unchanged, reflecting acceptable overall tolerability.

Conflicts of Interest

Dmitry Bordin: Speakers Bureau/Honoraria: speaker for Abbott, AstraZeneca, Biocodex, PRO.MED.CS Praha a.s., Dr. Reddy's Laboratories, Alfasigma, Reckitt Benckiser., Dmitry Andreev: None, Sayar Ab-

dulkhakov: None, Irina Voynovan: None, Igor Bakulin: None, Natalia Bakulina: None, Ludmila Vologzhanina: None, Larisa Tarasova: None, Alla Kononova: None, Galina Tarasova: None, Olga Kolokolnikova: None, Maria Livzan: None, Alba Singla: None, Oriol Farrés: None, Leticia Moreira: None, Pablo Parra: Research Grant: European Union programme HORIZON (grant agreement number 101095359) and supported by the UK Research and Innovation (grant agreement number 10058099). European Union programme EU4Health (grant agreement number 101101252).; Other Research Support: European Helicobacter and Microbiota Study Group (EHMSG; www.helicobacter.org) and received support from the Spanish Association of Gastroenterology (AEG) and the Centro de Investigación Biomédica en Red de Enfermedades Hepáticas y Digestivas (CIBERehd)., Olga Nyssen: Research Grant: European Union programme HORIZON (grant agreement number 101095359) and supported by the UK Research and Innovation (grant agreement number 10058099). European Union programme EU4Health (grant agreement number 101101252).; Other Research Support: European Helicobacter and Microbiota Study Group (EHMSG; www.helicobacter.org) and received support from the Spanish Association of Gastroenterology (AEG) and the Centro de Investigación Biomédica en Red de Enfermedades Hepáticas y Digestivas (CIBERehd).; Speakers Bureau/Honoraria: speaker for Mayoly, Diasorin, Juvisé, Biocodex, Zambon., Francis Megraud: None, Colm O'Morain: None, Javier Gisbert: Research Grant: European Union programme HORIZON (grant agreement number 101095359) and supported by the UK Research and Innovation (grant agreement number 10058099). European Union programme EU4Health (grant agreement number 101101252).; Other Research Support: European Helicobacter and Microbiota Study Group (EHMSG; www.helicobacter.org) and received support from the Spanish Association of Gastroenterology (AEG) and the Centro de Investigación Biomédica en Red de Enfermedades Hepáticas y Digestivas (CIBERehd).; Speakers Bureau/Honoraria: speaker for Mayoly, Diasorin, Juvisé, Biocodex, Zambon.

POSTER SESSION 10 - HELICOBACTER 8

P10.05.

EFFECTIVENESS OF EMPIRICAL *HELICOBACTER PYLORI* TREATMENT IN POLAND: RESULTS FROM THE EUROPEAN REGISTRY ON *H. PYLORI* MANAGEMENT (HP-EUREG)

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Objective: *Helicobacter pylori* (*H. pylori*) infection remains a major global health concern and a leading cause of gastric cancer, with treatment effectiveness influenced by regional antibiotic resistance. This study evaluates the effectiveness and safety of empirical first- and second-line therapies in Poland and compares real-world outcomes with current recommendations.
Patients and Methods: Data were analyzed from the Polish cohort of the European Registry on *H. pylori* Management (Hp-EuReg, WorldHpReg partner, AEG-REDCap e-CRF, 2013-June 2024). Treatment effectiveness was assessed using modified intention-to-treat analysis.
Results: A total of 638 patients were included. The overall first-line effectiveness was 89%. The most frequently used regimens were bismuth-based quadruple therapies (BQT), administered either as a single-capsule formulation or with drugs separately (metronidazole-tetracycline-bismuth), accounting for 78%. These regimens achieved eradication rates close to 90%, with the highest effectiveness in 14-day therapies (>90%). Triple therapy with amoxicillin-metronidazole (Triple-AM) achieved an eradication rate of 88%. Treatment duration significantly influenced outcomes: 14-day regimens were more effective than 10-day therapies. High-dose proton pump inhibitors (PPIs) improved effectiveness in first-line Triple-AM, whereas this benefit was not observed in quadruple regimens. Overall, second-line effectiveness was approximately 65%, but higher eradication rates (>90%) were observed in selected 14-day regimens (e.g., BQT or amoxicillin-levofloxacin triple therapy).
Conclusions: In Polish routine clinical practice, first-line eradication rates approached 90%, while second-line therapies remained below this threshold. The highest effectiveness was achieved with BQT regimens administered for 10-14 days, with improved outcomes at 14 days. High-dose PPIs enhanced the effectiveness of first-line Triple-AM, but not that of quadruple therapies.

Conflicts of Interest
Piotr Szredzki: None, Wojciech Marlicz: None, Piotr Eder: None, Michał Kukla: None, Georges Kam-toh: None, Aleksandra Szredzka: None, Maria Marlicz: None, Paweł Guzik: None, Wojciech Siwiaszczyk: None, Magdalena Kuźma: None, Gabriela Leniart: None, Anna Cano-Català: None, Leticia Moreira: None, Pablo Parra: None, Olga P. Nyssen: None, Francis Mégraud: None, Javier P. Gisbert: None, Colm O'Morain: None.