AstraZeneca

STUDY REPORT SUMMARY

ASTRAZENECA PHARMACEUTICALS

FINISHED PRODUCT: NO DRUG
ACTIVE INGREDIENT: NO DRUG

Study No: NIS-GEU-DUM-2010/1
European Real Life Study on NSAIDs Treated Patients With Osteoarthritis (OA), Rheumatoid Arthritis (RA) and Ankylosing Spondylitis (AS): Assessment of Pain Relieve, Gastrointestinal (GI) Symptoms, Adherence and Health Resource Consumption.

Developmental Phase: Observational
Study Completion Date: 31/08/2011
Date of Report: 20/07/2012

OBJECTIVES:

Primary objective:

To quantify the incidence of selected GI events (symptomatic and/or complicated reported by patients with Osteoarthritis (OA), Rheumatoid Arthritis (RA), or Ankylosing Spondilitis (AS) and treated with NSAIDs.

Secondary objectives:

- To assess the percentage of patients at risk for GI events with NSAID treatment not receiving concomitant PPI treatment.
- To estimate costs and health-related quality of life (HRQoL) impact of GI events in NSAID-treated patients with and without concomitant PPI treatment.
- To estimate adherence with PPI treatment and the relationship to the rate of GI events and related costs
- To assess the relationship between patients' satisfaction with treatment and persistence and treatment adherence
- To describe clinical outcomes with NSAID therapy, including a comparison of different management strategies

METHODS:

This was a multinational, multicentre, observational, ambispective (retrospective period of 2 to 12 weeks and prospective period of 6 months), cohort study of adult patients with GI risk factors and a NSAID therapy initiation for OA, RA, or AS during the 12 weeks previous to enrollment.

A NIS is a study in which no additional diagnostic or monitoring procedures shall be applied to the patients.

To ensure a valid picture of real life management per country, representative centres (in terms of disease management), were identified and selected. These centres could be Primary Care (PC) centres and/or specialist centres and/or hospitals.

Diagnosis and Main Criteria for Inclusion: Potential study patients were those having initiated a new NSAID treatment (index prescription) in the period from 12 to 2 weeks before enrolment visit (selection period), maintained or not when visiting the study site during the enrollment visit, and with GI risk factors (i.e. aged > 60 years, and/or a documented history of peptic ulcers, and/or receiving concomitant treatment with acetylsalicylic acid, anticoagulants, selective serotonin reuptake inhibitors or oral corticosteroids).

RESULTS:

Table 1. Demographics and Baseline Characteristics (Evaluable Population)

Variable	Total (N = 4144)
Gender, N (%)	
Male	1436 (34.65)
Female	2708 (65.35)
Ethnicity, N (%)	
Caucasian	3879 (98.13)
Black	12 (0.30)
Oriental	34 (0.86)
Other	28 (0.71)
Missing	191
Age (yrs), mean (SD)	66.34 (11.07)
Height (cm), mean (SD)	165.29 (9.28)
Weight (kg), mean (SD)	77.21 (15.43)
Years of education, mean (SD)	10.03 (4.58)
Current professional status, N (%)	
Employed	771 (18.61)
Homemaker	590 (14.24)
Unemployed	113 (2.73)
Retired	2464 (59.46)
Student	4 (0.10)
Sick leave	78 (1.88)
Disabled	72 (1.74)
Unknown	52 (1.25)
Type of disability, N (%)	
Temporary	5 (6.94)
Permanently	64 (88.89)
Unknown	3 (4.17)
Missing	4072

Variable	Total (N = 4144)
Smoking status, N (%)	
Non-smoker	2730 (65.88)
Ex-smoker	784 (18.92)
Occasional smoker	142 (3.43)
Habitual smoker	467 (11.27)
Unknown	21 (0.51)

Table 2. Incidence and distribution of GI events (Evaluable Population)

Variable		Total (N=4144)
Patients with at least one event		
No	N (%)	3684 (88.90%)
Yes	N (%)	460 (11.10%)
Total events		704
Total person-years		2422.4
Incidence rate		19.00
95% CI lower limit		17.30
95% CI upper limit		20.80
p-value [1]		<0.0001
Time to first event. Hazard ratio [2]		
95% CI lower limit		
95% CI upper limit		
p-value [3]		<0.0001
GI Event	N (%)	
Gastritis		96 (2.32%)
Oesophagitis		23 (0.56%)
Dyspepsia		152 (3.67%)
Heartburn		79 (1.91%)
Hiatus hernia		14 (0.34%)
Ulcer: gastric		9 (0.22%)
Abdominal pain		127 (3.06%)
Regurgitation		32 (0.77%)
Ulcer: peptic		7 (0.17%)
Ulcer: duodenal		4 (0.10%)
Nausea		51 (1.23%)
Diarrhoea		39 (0.94%)
Duodenitis		3 (0.07%)
Chest pain		6 (0.14%)
Melena		5 (0.12%)
Haemorrhage intestinal (with hospitalization)		1 (0.02%)
Vomiting		20 (0.48%)
Ulcer: oesophageal		1 (0.02%)

Variable	Total (N=4144)
Bleeding of the rectum and anus	3 (0.07%)
Diverticulitis	5 (0.12%)
Acute mucosal lesion	1 (0.02%)
GI surgery	2 (0.05%)

[1] Based on Poisson regression comparing all 12 countries adjusted for gender and age. Overall not included.
[2] Based on Cox Proportional Hazards modeling with overall as reference.
[3] Based on Cox Proportional Hazards modeling comparing all 12 countries. Overall not included.

Table 3. PPI use at Visit 1 (Evaluable Population)

Variable		Total (N=4144)
Any PPI use in last 12 weeks		
No	N (%)	2230 (53.81%)
Yes	N (%)	1914 (46.19%)
Ongoing at Visit 1		
No	N (%)	744 (38.87%)
Yes	N (%)	1170 (61.13%)
Missing	N	2230
Length of time first PPI (days) [1]		
	N	1703
	Mean (SD)	551.33 (1055.8)
	95%CI	(501.14,601.51)
	Median(IR)	69 (604)
	[Min, Max]	[1, 11639]

[1] For ongoing medication length is based on Visit 1 date

Table 4. Patient Reported Outcomes (Visit 3) by PPI use (Evaluable Population)

Variable		On PPI	Off PPI
Health state (EQ-5D)	N	1753	2104
	Mean (SD)	64.15 (18.02)	66.48 (17.82)
	95%CI	(63.31,65.00)	(65.71,67.24)
	Median(IR)	67(30)	70(25)
	[Min, Max]	[0,100]	[0,100]
Total score (WOMAC)	N	1594	1847
	Mean (SD)	34.41 (20.62)	30.30 (19.90)
	95%CI	(33.40,35.42)	(29.39,31.21)
	Median(IR)	34.00(32.00)	29.00(32.00)
	[Min, Max]	[0.00,96.00]	[0.00,96.00]
Overall satisfaction (TSQM)	N	1667	1956
	Mean (SD)	60.75 (19.49)	63.40 (19.02)
	95%CI	(59.81,61.68)	(62.56,64.24)
	Median(IR)	64.29(21.43)	64.29(28.57)

Variable		On PPI	Off PPI
	[Min,Max]	[0.00,100.00]	[0.00,100.00]
Total score (MMAS – Pain medication)	N (%)		
0		496 (32.12%)	509 (29.09%)
1		370 (23.96%)	510 (29.14%)
2		362 (23.45%)	442 (25.26%)
3		146 (9.46%)	144 (8.23%)
4		170 (11.01%)	145 (8.29%)
Total score (MMAS – Ulcer medication)	N (%)		
0		701 (47.82%)	327 (42.52%)
1		245 (16.71%)	142 (18.47%)
2		258 (17.60%)	154 (20.03%)
3		114 (7.78%)	63 (8.19%)
4		148 (10.10%)	83 (10.79%)