

GSK Medicine: Fondaparinux Sodium																	
Study No.: 111271																	
Title: Arixtra observational study: A multi-centre, prospective observational study to evaluate the incidence of venous thromboembolism (VTE) in Korean patients with Arixtra™ therapy in real world setting																	
Rationale: The safety and effectiveness of Arixtra™ has been established in many clinical trials. But, routine clinical practice can be different from the interventional study setting. Therefore, it was necessary to identify the rate of VTE and adverse events in routine practice using an observational study design. The present study collected clinical effectiveness data, and safety data.																	
Objectives: The primary objective of this observational study was to identify the rate of VTE in Korean patients with Arixtra therapy according to the local PI.																	
Indication: Prevention of Venous Thromboembolic Events (VTE) in patients undergoing major orthopaedic surgery of the lower limbs such as: hip fracture, including extended prophylaxis, knee replacement surgery, hip replacement surgery																	
Study Investigators/ Centers: 40 Investigators/28 Centers																	
Data Source: Standardized hard copy Case Report Form (CRF)																	
Study Design: Non-intervention: Open-label, single group, multicenter observational study																	
Study Population: Male and female subjects who were considered appropriate to take fondaparinux according to the prescribing information were eligible for this study. Subjects who had previously been treated with fondaparinux were not eligible for this study.																	
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Study Exposures, Outcomes: Primary outcome was the occurrence of VTE after fondaparinux administration. Secondary outcomes were occurrence of major bleeding after fondaparinux administration and any adverse events after fondaparinux administration.																	
Data Analysis Methods: The percentage of subjects reporting each individual adverse event during the follow-up period after administration of the study drug was tabulated with 95% confidence interval; to identify the risk factors related to the incidence of any adverse events and the rate of major bleeding, epidemiological/descriptive methods and Chi-square test or Fisher's exact test were used for the analysis of collected data.																	
Limitations: As being an observational study, there was no comparison group.																	

Demographics/Baseline Characteristics:	
N (ITT Safety population)	1,886
Female: Male (%)	64.3 : 35.7
Mean age, years ±SD	63.3±16.2
Type of surgery, N (%)	
Hip fracture surgery	405(21.5)
Knee replacement surgery	663(35.2)
Hip replacement surgery	539(28.6)
Others	279(14.8)
Concomitant disease, N(%)	
Yes	1,015(53.8)
No	871(46.2)
Concomitant medication, N(%)	
Yes	1,090(57.8)
No	796(42.2)

Primary Outcome:			
Efficacy (PP population), N	1811		
Occurrence of VTE, N(%)			
Yes	5(0.3)		
No	1,706(99.7)		
Efficacy judged by the investigators, N(%)			
Effective	1.706(99.7)		
Ineffective	5(0.3)		
Secondary Outcome:			
Safety (ITT population), N	1886		
Major bleeding, N(%)	42(2.2)		
Post-operative haemorrhage	39(2.1)		
Haemorrhage NOS	3(0.2)		
Overall incidence of adverse events, N(%)	479(25.4)		
Exact 95% Confidence interval for overall incidence	23.4, 27.4		
Unexpected adverse events, n	208		
Subjects with unexpected adverse events, N(%)	166(8.8)		
Serious adverse events, N(%)	4(0.2)		
Covariates	Yes (N=479)	No (N=1,407)	p-value
Gender, n(%)			
Male	139(20.6)	535(79.4)	0.0004
Female	340(28.1)	872(72.0)	
Concomitant disease, n(%)			
Yes	290(28.6)	725(71.4)	0.0006
No	189(21.7)	682(78.3)	
Type of surgery			
Hip fracture surgery	80(19.8)	325(80.3)	0.0061
Knee replacement surgery	192(29.0)	471(71.0)	
Hip replacement surgery	130(24.1)	409(75.9)	
Others	77(27.6)	202(72.4)	
Concomitant medication, n(%)			
Yes	351(32.2)	739(67.8)	<0.0001
NO	128(16.1)	668(84.0)	
Safety Results:			
Most Frequent Adverse Events – On-Therapy, n(%)	Fondaparinux sodium(N=1,886)		
Subjects with any AE(s), N(%)			
Constipation	127(6.7)		
Pyrexia	57(3.0)		
Dyspepsia	53(2.8)		
Nausea	50(2.7)		
Sleep disorder	43(2.3)		
Headache	40(2.1)		
Post-operative haemorrhage	39(2.1)		
Diarrhoea	37(2.0)		
Localized oedema	30(1.6)		
Surgical site reaction	23(1.2)		
Subjects with any SAE(s), N(%) [includes SAE related to fondaparinux sodium]	4(0.2)		
Dyspnea	1(0.05)[0]		
Wheezing	1(0.05)[0]		
Hemoglobin decreased	1(0.05)[1]		
Post-operative hemorrhage	1(0.05)[1]		
Pneumonia aspiration	1(0.05)[0]		
Acute myocardial infarction	1(0.05)[0]		
Conclusion:			

The incidence of VTE was 0.3 % (5/1,711) and the overall efficacy rate was 99.7 % (1,706/1,711).

The incidence of adverse events was 25.4 % (479/1886, 95%CI interval: 23.4-27.4).

The most frequent adverse event was constipation (6.7%, 127 subjects).

The incidence of serious adverse event (SAE) was 0.2 % (4/1,886).

Note: The result of this study was submitted to KFDD including the Arixtra observational study. The result of Arixtra PMS only was also submitted to VCTR.(108034)