Clinical trial results:
A Phase 3b, Multi-center, Randomized, Double-blind, Placebo-controlled, Parallel-group Trial with an Open-label Extension Phase to Evaluate the Efficacy and Safety of Avatrombopag for the Treatment of Thrombocytopenia in Pediatric Subjects with Immune Thrombocytopenia for 6 Months

Summary

EudraCT number	2020-003232-24
Trial protocol	FR HU DE PL
Global end of trial date	

Results information

Result version number	v1
This version publication date	22 May 2024
First version publication date	22 May 2024

Trial information

Trial identification

Sponsor protocol code	AVA-PED-301

Additional study identifiers

ISRCTN number	-
ClinicalTrials.gov id (NCT number)	NCT04516967
WHO universal trial number (UTN)	-

Notes:

Sponsors

Sponsor organisation name	Sobi Inc.
Sponsor organisation address	890 Winter Street, Suite 200, Waltham, United States, 02451
Public contact	Medical Information, Sobi, Inc., +1 781 786 7370, medinfo.us@sobi.com
Scientific contact	Medical Information, Sobi, Inc., +1 781 786 7370, medinfo.us@sobi.com

Notes:

Paediatric regulatory details

Is trial part of an agreed paediatric investigation plan (PIP)	Yes
EMA paediatric investigation plan number(s)	EMEA-001136-PIP01-11
Does article 45 of REGULATION (EC) No 1901/2006 apply to this trial?	No
Does article 46 of REGULATION (EC) No 1901/2006 apply to this trial?	Yes

Notes:

Results analysis stage

Analysis stage	Interim
Date of interim/final analysis	18 December 2023
Is this the analysis of the primary completion data?	Yes
Primary completion date	08 November 2023
Global end of trial reached?	No

Notes:

General information about the trial

Main objective of the trial:

To demonstrate that the efficacy of avatrombopag is superior to placebo for the treatment of pediatric subjects with ITP of ≥6 months duration who have had an insufficient response to a previous treatment

Protection of trial subjects:

The study was in compliance with the ethical principles derived from the Declaration of Helsinki and the International Conference on Harmonization (ICH) and Good Clinical Practice (GCP) guidelines. All the local regulatory requirements pertinent to safety of trial subjects were also followed during the conduct of the trial.

Background therapy: -

Evidence for comparator: -

Actual start date of recruitment	02 March 2021
Long term follow-up planned	No
Independent data monitoring committee (IDMC) involvement?	Yes

Notes:

Population of trial subjects

Subjects enrolled per country

Country: Number of subjects enrolled	Poland: 4
Country: Number of subjects enrolled	United Kingdom: 13
Country: Number of subjects enrolled	France: 1
Country: Number of subjects enrolled	Germany: 3
Country: Number of subjects enrolled	Hungary: 5
Country: Number of subjects enrolled	United States: 13
Country: Number of subjects enrolled	Russian Federation: 5
Country: Number of subjects enrolled	Ukraine: 2
Country: Number of subjects enrolled	Türkiye: 29
Worldwide total number of subjects	75
EEA total number of subjects	13

Notes:

Subjects enrolled per age group

In utero	0
Preterm newborn - gestational age < 37 wk	0
Newborns (0-27 days)	0
Infants and toddlers (28 days-23 months)	1

Children (2-11 years)	45
Adolescents (12-17 years)	29
Adults (18-64 years)	0
From 65 to 84 years	0
85 years and over	0

Subject disposition

Recruitment

Recruitment details: -

Pre-assignment

Screening details:

To be eligible for the study, the subject must have had a confirmed diagnosis of primary ITP for ≥6 months duration and had an insufficient response to a previous treatment with an average of 2 platelet counts <30×10^9/L with no single count >35×10^9/L.

Period 1

Period 1 title	Core Phase (overall period)
Is this the baseline period?	Yes
Allocation method	Randomised - controlled
Blinding used	Double blind
Roles blinded	Subject, Investigator, Monitor, Data analyst, Carer, Assessor

Arms

Are arms mutually exclusive?	Yes
Arm title	Avatrombopag

Arm description: -

Arm type	Experimental
Investigational medicinal product name	Avatrombopag
Investigational medicinal product code	
Other name	
Pharmaceutical forms	Powder for oral suspension, Tablet
Routes of administration	Oral use

Dosage and administration details:

Subjects received avatrombopag or matching placebo as either the film-coated oral tablet or the powder for oral suspension. The powder for oral suspension was contained in a capsule that was to be opened to sprinkle the contents into an appropriate vehicle to prepare the suspension. No partial dosing from the capsule was allowed; the entire contents were to be used to prepare the suspension. On Day 1, Cohort 1 (≥12 to <18 years old) and Cohort 2 (≥6 to <12 years old) had a starting dose of avatrombopag of 20 mg once daily, administered as an oral tablet, consistent with the approved adult dosing. The starting dose for Cohort 3 (≥1 to <6 years old) was 10 mg once daily administered as an oral suspension. The dose of study drug was to be titrated up or down based on the subject's platelet count to maintain a platelet count between ≥50 and ≤150×10^9/L.

Arm title	Placebo

Arm description: -

Arm type	Placebo
Investigational medicinal product name	Placebo to match avatrombopag
Investigational medicinal product code	
Other name	
Pharmaceutical forms	Powder for oral suspension, Tablet
Routes of administration	Oral use

Dosage and administration details:

Subjects received avatrombopag or matching placebo as either the film-coated oral tablet or the powder for oral suspension. The powder for oral suspension was contained in a capsule that was to be opened to sprinkle the contents into an appropriate vehicle to prepare the suspension. No partial dosing from the capsule was allowed; the entire contents were to be used to prepare the

suspension. On Day 1, Cohort 1 (≥12 to <18 years old) and Cohort 2 (≥6 to <12 years old) had a starting dose of avatrombopag of 20 mg once daily, administered as an oral tablet, consistent with the approved adult dosing. The starting dose for Cohort 3 (≥1 to <6 years old) was 10 mg once daily administered as an oral suspension. The dose of study drug was to be titrated up or down based on the subject's platelet count to maintain a platelet count between ≥50 and ≤150×10^9/L.

Number of subjects in period 1	Avatrombopag	Placebo
Started	54	21
Completed	44	1
Not completed	10	20
Physician decision	1	1
Adverse event, non-fatal	2	1
Lack of efficacy	7	18

Baseline characteristics

Reporting groups	
Reporting group title	Avatrombopag
Reporting group description: -	
Reporting group title	Placebo
Reporting group description: -	

Reporting group values	Avatrombopag	Placebo	Total
Number of subjects	54	21	75
Age categorical Units: Subjects			
Infants and toddlers (28 days-23 months)	1	0	1
Children (2-11 years)	32	13	45
Adolescents (12-17 years)	21	8	29
Age continuous Units: years			
arithmetic mean	8.9	9.9	
standard deviation	± 4.36	± 4.13	-
Gender categorical Units: Subjects			
Female	24	12	36
Male	30	9	39

Subject analysis sets	
Subject analysis set title	Full Analysis Set
Subject analysis set type	Full analysis
Subject analysis set description: All randomized subjects.	

Reporting group values	Full Analysis Set		
Number of subjects	75		
Age categorical Units: Subjects			
Infants and toddlers (28 days-23 months)	1		
Children (2-11 years)	45		
Adolescents (12-17 years)	29		
Age continuous Units: years			
arithmetic mean			
standard deviation	±		
Gender categorical Units: Subjects			
Female			
Male			

End points

End points reporting groups

Reporting group title	Avatrombopag
Reporting group description: -	
Reporting group title	Placebo
Reporting group description: -	
Subject analysis set title	Full Analysis Set
Subject analysis set type	Full analysis
Subject analysis set description:	
All randomized subjects.	

Primary: Durable Platelet Response

End point title	Durable Platelet Response
End point description:	
The primary efficacy endpoint was durable platelet response as defined by the proportion of subjects achieving at least 6 out of 8 weekly platelet counts ≥50×10^9/L during the last 8 weeks of the 12-week Treatment Period in the Core Phase in the absence of rescue medication.	
End point type	Primary
End point timeframe:	
12 Weeks	

End point values	Avatrombopag	Placebo		
Subject group type	Reporting group	Reporting group		
Number of subjects analysed	54	21		
Units: Percentage				
Yes	15	0		
No	39	21		

Statistical analyses

Statistical analysis title	Durable Platelet Response
Comparison groups	Avatrombopag v Placebo
Number of subjects included in analysis	75
Analysis specification	Pre-specified
Analysis type	equivalence
P-value	= 0.0077
Method	Fisher exact

Primary: Platelet Response

End point title	Platelet Response
End point description:	
Platelet response was defined as having at least 2 consecutive platelet assessments ≥50×10^9/L over	

the 12 weeks of treatment in the Core Phase in the absence of rescue medication.

End point type	Primary

End point timeframe:
12 Weeks

End point values	Avatrombopag	Placebo		
Subject group type	Reporting group	Reporting group		
Number of subjects analysed	54	21		
Units: Percentage				
Yes	44	0		
No	10	21		

Statistical analyses

Statistical analysis title	Platelet Response - FAS
Comparison groups	Avatrombopag v Placebo
Number of subjects included in analysis	75
Analysis specification	Pre-specified
Analysis type	equivalence
P-value	= 0.0067
Method	Fisher exact

Adverse events

Adverse events information	
Timeframe for reporting adverse events: 12 weeks	
Assessment type	Systematic

Dictionary used	
Dictionary name	MedDRA
Dictionary version	26.1

Reporting groups	
Reporting group title	Avatrombopag
Reporting group description: -	
Reporting group title	Placebo
Reporting group description: -	

Serious adverse events	Avatrombopag	Placebo	
Total subjects affected by serious adverse events			
subjects affected / exposed	5 / 54 (9.26%)	1 / 21 (4.76%)	
number of deaths (all causes)	0	0	
number of deaths resulting from adverse events	0	0	
Nervous system disorders			
Headache			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	1 / 1	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Blood and lymphatic system disorders			
Immune thrombocytopenia			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	0 / 2	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Thrombocytosis			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	1 / 1	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Gastrointestinal disorders			
Mouth haemorrhage			

subjects affected / exposed	1 / 54 (1.85%)	1 / 21 (4.76%)	
occurrences causally related to treatment / all	0 / 1	0 / 1	
deaths causally related to treatment / all	0 / 0	0 / 0	
Oral purpura			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	0 / 1	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Rectal haemorrhage			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	0 / 1	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Respiratory, thoracic and mediastinal disorders			
Epistaxis			
subjects affected / exposed	1 / 54 (1.85%)	0 / 21 (0.00%)	
occurrences causally related to treatment / all	0 / 1	0 / 0	
deaths causally related to treatment / all	0 / 0	0 / 0	
Skin and subcutaneous tissue disorders			
Skin haemorrhage			
subjects affected / exposed	0 / 54 (0.00%)	1 / 21 (4.76%)	
occurrences causally related to treatment / all	0 / 0	0 / 1	
deaths causally related to treatment / all	0 / 0	0 / 0	

Frequency threshold for reporting non-serious adverse events: 5 %

Non-serious adverse events	Avatrombopag	Placebo	
Total subjects affected by non-serious adverse events			
subjects affected / exposed	50 / 54 (92.59%)	16 / 21 (76.19%)	
Injury, poisoning and procedural complications			
Contusion			
subjects affected / exposed	3 / 54 (5.56%)	1 / 21 (4.76%)	
occurrences (all)	7	1	
Vascular disorders			
Haematoma			

subjects affected / exposed	3 / 54 (5.56%)	3 / 21 (14.29%)	
occurrences (all)	3	6	
Nervous system disorders			
Headache			
subjects affected / exposed	10 / 54 (18.52%)	4 / 21 (19.05%)	
occurrences (all)	22	4	
General disorders and administration site conditions			
Pyrexia			
subjects affected / exposed	9 / 54 (16.67%)	0 / 21 (0.00%)	
occurrences (all)	9	0	
Gastrointestinal disorders			
Diarrhoea			
subjects affected / exposed	4 / 54 (7.41%)	0 / 21 (0.00%)	
occurrences (all)	5	0	
Vomiting			
subjects affected / exposed	4 / 54 (7.41%)	0 / 21 (0.00%)	
occurrences (all)	6	0	
Abdominal Pain			
subjects affected / exposed	3 / 54 (5.56%)	0 / 21 (0.00%)	
occurrences (all)	3	0	
Gingival bleeding			
subjects affected / exposed	2 / 54 (3.70%)	2 / 21 (9.52%)	
occurrences (all)	2	3	
Rectal haemorrhage			
subjects affected / exposed	0 / 54 (0.00%)	2 / 21 (9.52%)	
occurrences (all)	0	2	
Respiratory, thoracic and mediastinal disorders			
Epistaxis			
subjects affected / exposed	12 / 54 (22.22%)	4 / 21 (19.05%)	
occurrences (all)	30	9	
Cough			
subjects affected / exposed	9 / 54 (16.67%)	0 / 21 (0.00%)	
occurrences (all)	11	0	
Oropharyngeal pain			
subjects affected / exposed	7 / 54 (12.96%)	0 / 21 (0.00%)	
occurrences (all)	7	0	

Rhinorrhoea			
subjects affected / exposed	3 / 54 (5.56%)	0 / 21 (0.00%)	
occurrences (all)	3	0	
Skin and subcutaneous tissue disorders			
Petechiae			
subjects affected / exposed	14 / 54 (25.93%)	6 / 21 (28.57%)	
occurrences (all)	20	6	
Ecchymosis			
subjects affected / exposed	10 / 54 (18.52%)	1 / 21 (4.76%)	
occurrences (all)	19	1	
Musculoskeletal and connective tissue disorders			
Arthralgia			
subjects affected / exposed	4 / 54 (7.41%)	0 / 21 (0.00%)	
occurrences (all)	6	0	
Pain in extremity			
subjects affected / exposed	3 / 54 (5.56%)	0 / 21 (0.00%)	
occurrences (all)	4	0	
Infections and infestations			
Upper respiratory tract infection			
subjects affected / exposed	6 / 54 (11.11%)	2 / 21 (9.52%)	
occurrences (all)	6	2	
COVID-19			
subjects affected / exposed	4 / 54 (7.41%)	1 / 21 (4.76%)	
occurrences (all)	4	1	
Nasopharyngitis			
subjects affected / exposed	4 / 54 (7.41%)	0 / 21 (0.00%)	
occurrences (all)	5	0	
Viral upper respiratory tract infection			
subjects affected / exposed	3 / 54 (5.56%)	0 / 21 (0.00%)	
occurrences (all)	5	0	

More information

Substantial protocol amendments (globally)

Were there any global substantial amendments to the protocol? Yes

Date	Amendment
17 December 2020	Amendment 1 refined several inclusion and exclusion criteria, clarified the allowable contraception methods, aligned the definition of a lack of treatment effect in the Extension Phase with the Core Phase definition, and confirmed that a protocol amendment would be implemented if two subjects in Cohort 3 require medical monitor approved dose escalations above 20 mg daily.
02 November 2021	Amendment 2 updated the sponsor name, and clarified corticosteroid use prior to Baseline, the minimum subject age at Baseline, and the timing of serial PK sampling.

Notes:

Interruptions (globally)

Were there any global interruptions to the trial? No

Limitations and caveats

None reported