Clinical trial results:
MESI-STRAT WOO 2 Trial / MESI-STRAT
Prospective Window of opportunity trial of 3 weeks neoadjuvant Anastrozole in Postmenopausal Women with Estrogen receptor positive (ER+) Breast Cancer: WOO 2

Summary

EudraCT number	2020-003960-22
Trial protocol	AT
Global end of trial date	09 June 2023
Results information	
Result version number	v1 (current)
This version publication date	22 June 2024
First version publication date	22 June 2024
Summary attachment (see zip file)	Justification letter non-reported endpoints (MESI STRAT WOO2 Justification Letter Non-Reported End Points.pdf)

Trial information

Trial identification	
Sponsor protocol code	WOO2
Additional study identifiers	
ISRCTN number	-
ClinicalTrials.gov id (NCT number)	-
WHO universal trial number (UTN)	-

Notes:

Sponsors	
Sponsor organisation name	Medizinische Universität Innsbruck
Sponsor organisation address	Innrain 52, Innsbruck, Austria, 6020
Public contact	Regina Berger, Medizinische Universität Innsbruck Univ.-Klinik f. Gynäkologie und Geburtshilfe, regina.berger@i-med.ac.at
Scientific contact	Daniel Egle, Medizinische Universität Innsbruck Univ.-Klinik f. Gynäkologie und Geburtshilfe, Daniel.Egle@tirol-kliniken.at

Notes:

Paediatric regulatory details	
Is trial part of an agreed paediatric investigation plan (PIP)	No
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?	No

Notes:

Results analysis stage

Analysis stage	Final
Date of interim/final analysis	29 November 2023
Is this the analysis of the primary completion data?	Yes
Primary completion date	09 June 2023
Global end of trial reached?	Yes
Global end of trial date	09 June 2023
Was the trial ended prematurely?	No

Notes:

General information about the trial

Main objective of the trial:

Comparison of kynurenine concentration before and after 21 days treatment with Anastrozole

Protection of trial subjects:

The trial medication Anastrozole is a standard of care therapy for postmenopausal women. For ethical reasons only women that would receive an aromatase inhibitor after surgery will be included in the WOO 2 trial. Therefore only the sequence of aromatase inhibitor application will be altered as Anastrozole will be given for 3 weeks before routine surgery as opposed to its regular adjuvant application. Anastrozole is well known and approved by Austrian regulatory authorities for the treatment of postmenopausal ER+ BC patients. Due to its safety profile we expect only few serious adverse events (SAEs) to occur. All relevant safety information can be found in the Summary of Product Characteristics (SmPC). The IMU is experienced in neoadjuvant administration of Anastrozole.

Background therapy: -

Evidence for comparator: -

Actual start date of recruitment	02 November 2020
Long term follow-up planned	No
Independent data monitoring committee (IDMC) involvement?	No

Notes:

Population of trial subjects

Subjects enrolled per country

Country: Number of subjects enrolled	Austria: 56
Worldwide total number of subjects	56
EEA total number of subjects	56

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)	0
Children (2-11 years)	0

Adolescents (12-17 years)	0
Adults (18-64 years)	18
From 65 to 84 years	38
85 years and over	0

Subject disposition

Recruitment

Recruitment details:

A total of 50 patients, who have received treatment, are required for analysis. Screening failure but not the drop-out rate is expected to be high, recruitment will commence once a total of 50 patients have started treatment.

Pre-assignment

Screening details:

During the screening phase the eligibility of the patient is assessed. The screening visit includes verification of all inclusion and exclusion criteria. Written informed consent is obtained. No trial specific interventions were made prior to written consent of the patient.

Pre-assignment period milestones

Number of subjects started	56
Number of subjects completed	56

Period 1

Period 1 title	Pre-treatment (overall period)
Is this the baseline period?	Yes
Allocation method	Not applicable
Blinding used	Not blinded

Arms

Arm title	All participants

Arm description: -

Arm type	Experimental
Investigational medicinal product name	ARIMIDEX 1mg
Investigational medicinal product code	
Other name	Anastrozole
Pharmaceutical forms	Tablet
Routes of administration	Oral use

Dosage and administration details:

1 mg per day orally

Number of subjects in period 1	All participants
Started	56
Completed	52
Not completed	4
Consent withdrawn by subject	3
No surgery possible due to atrial fibrillation.	1

Baseline characteristics

Reporting groups	
Reporting group title	All participants

Reporting group description: -

Reporting group values	All participants	Total	
Number of subjects	56	56	
Age categorical Units: Subjects			
Adults (18-64 years)	18	18	
From 65-84 years	38	38	
85 years and over	0	0	
Age continuous Units: years			
arithmetic mean	69.1		
standard deviation	± 8.4	-	
Gender categorical Units: Subjects			
Female	56	56	

End points

End points reporting groups

Reporting group title	All participants

Reporting group description: -

Primary: kynurenine level (KYN)

End point title	kynurenine level (KYN)[1]

End point description:

End point type	Primary

End point timeframe:

Before treatment start and directly after 21 days of neoadjuvant Anastrozole therapy.

Notes:

[1] - No statistical analyses have been specified for this primary end point. It is expected there is at least one statistical analysis for each primary end point.
Justification: Single arm study.

End point values	All participants			
Subject group type	Reporting group			
Number of subjects analysed	51			
Units: µM				
arithmetic mean (standard deviation)	1.57 (± 0.48)			

Statistical analyses

No statistical analyses for this end point

Secondary: change in Ki67 expression

End point title	change in Ki67 expression

End point description:

End point type	Secondary

End point timeframe:

21 days

End point values	All participants			
Subject group type	Reporting group			
Number of subjects analysed	51			
Units: percent				
arithmetic mean (standard deviation)	8.65 (± 5.30)			

Statistical analyses

No statistical analyses for this end point

Secondary: MESI network

End point title	MESI network

End point description:

End point type	Secondary

End point timeframe:

21 days

End point values	All participants			
Subject group type	Reporting group			
Number of subjects analysed	51			
Units: micromole(s)				
median (confidence interval 95%)	6.1 (3.94 to 8.46)			

Statistical analyses

No statistical analyses for this end point

Adverse events

Adverse events information

Timeframe for reporting adverse events:

Investigators collected adverse events (AEs) during measurements on all study days. The observation period started with the first IMP administration (preceded by medical history) and ended at the last study visit, about four weeks after the final dose.

Assessment type	Systematic

Dictionary used

Dictionary name	MedDRA
Dictionary version	27.0

Reporting groups

Reporting group title	All participants

Reporting group description: -

Serious adverse events	All participants		
Total subjects affected by serious adverse events			
subjects affected / exposed	1 / 56 (1.79%)		
number of deaths (all causes)	0		
number of deaths resulting from adverse events			
Cardiac disorders			
Infection-triggered cardiac decompensation			
subjects affected / exposed	1 / 56 (1.79%)		
occurrences causally related to treatment / all	0 / 1		
deaths causally related to treatment / all	0 / 0		

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

Non-serious adverse events	All participants		
Total subjects affected by non-serious adverse events			
subjects affected / exposed	22 / 56 (39.29%)		
Vascular disorders			
Hot flashes			
subjects affected / exposed	8 / 56 (14.29%)		
occurrences (all)	8		
Nervous system disorders			
Headache			

subjects affected / exposed occurrences (all)	6 / 56 (10.71%) 6		
General disorders and administration site conditions Fatigue subjects affected / exposed occurrences (all)	 5 / 56 (8.93%) 5		
Gastrointestinal disorders Nausea subjects affected / exposed occurrences (all)	 5 / 56 (8.93%) 6		
Psychiatric disorders Insomnia subjects affected / exposed occurrences (all)	 4 / 56 (7.14%) 5		

More information

Substantial protocol amendments (globally)

Were there any global substantial amendments to the protocol? Yes

Date	Amendment
01 February 2023	Change in timeline.

Notes:

Interruptions (globally)

Were there any global interruptions to the trial? No

Limitations and caveats

None reported