

Spinal Muscular Atrophy (SMA)

A clinical trial to look at how risdiplam is processed by the body and how safe it is in treatment of very young babies with spinal muscular atrophy

A Study to Investigate the Pharmacokinetics and Safety of Risdiplam in Infants With Spinal Muscular Atrophy

Trial Status Recruiting	Trial Runs In 8 Countries	Trial Identifier NCT05808764 2023-505602-42-00 BN44619
-----------------------------------	-------------------------------------	---

The information is taken directly from public registry websites such as ClinicalTrials.gov, EuClinicalTrials.eu, ISRCTN.com, etc., and has not been edited.

Official Title:

A phase II, open-label study to investigate the pharmacokinetics and safety of risdiplam in infants with spinal muscular atrophy

Trial Summary:

This study will evaluate the pharmacokinetics (PK) and safety of risdiplam in participants with spinal muscular atrophy (SMA) under 20 days of age at first dose.

Hoffmann-La Roche Sponsor	Phase 2 Phase
NCT05808764 2023-505602-42-00 BN44619 Trial Identifiers	

Eligibility Criteria:

Gender All	Age # 19 Days	Healthy Volunteers No
----------------------	-------------------------	---------------------------------

1. Why is the BN44619 clinical trial needed?

Spinal muscular atrophy (SMA) is an inherited disorder which causes weakness and wasting (atrophy) in muscles used for movement (skeletal muscles). It is caused by the

loss of certain specialized nerve cells, (motor neurons) in the brain and spinal cord that control muscle movement.

Risdiplam (also known as Evrysdi or RO7034067) is the first drug to be given by mouth (orally) for treatment of SMA. Risdiplam is approved for use in patients with SMA. However, it is considered as an experimental drug for the purpose of this study. This clinical trial aims to test how risdiplam is processed in the bodies of very young babies (infants) with SMA and if there are any side effects during treatment with risdiplam in very young babies.

2. How does the BN44619 clinical trial work?

This clinical trial is recruiting infants with a health condition called spinal muscular atrophy (SMA). Infant participants who enroll in this clinical trial will be given risdiplam once a day for 4 weeks. The trial doctor will see the participants 6 times during the study at site visits. The first site visit will be before the study starts to check if the infant is eligible to be a part of this study. The next 4 visits will take place on Days 1, 2, 5, and 10 during the 4-week treatment period. The final visit will be on Day 28 when the treatment period ends (study completion visit). These visits will include dosing the participant with risdiplam, checking to see how the infants respond to the treatment, any side effects they may have and to collect blood samples for study specific tests. Infants' parents will receive a follow up phone call 30 days after Day 28 or the infant's last dose of risdiplam, to check on the participant. Total time of participation in the clinical trial will be about 2 months. After Day 28, participants with no immediate access to any commercial treatment for SMA may continue to receive risdiplam in a Continued Provision of investigational medicinal product (IMP) Phase until this study ends. Participants can stop treatment and leave the clinical trial at any time.

3. What are the main endpoints of the BN44619 clinical trial?

The main clinical trial endpoint (the main result measured in the trial to see if the drug has worked) is to determine how the body processes risdiplam by measuring how much drug is present in the participants' body when assessed from Day 1 to Day 28 of the study. The other clinical trial endpoints are:

- Number of participants who experience any side effects and serious side effects due to risdiplam.
- Number of participants who discontinue from the study due to side effects.

4. Who can take part in this clinical trial?

Newborn infants aged <20 days at first dose, diagnosed with SMA can take part in this study. Participants may not be able to take part in this trial if they have symptoms or signs consistent with SMA Type 0, certain abnormalities related to blood pressure and electrical

activity of the heart. Participants also may not be able to take part if they have received treatments with nusinersen or onasemnogene abeparvovec in the past.

5. What treatment will participants be given in this clinical trial?

Every infant who joins this clinical trial will receive once daily a dose of risdiplam (liquid medicine) given by mouth or administered with a syringe inserted between gum and cheek of the participant. The participants should be fed before administration of the study drug. Risdiplam will be administered at home when there are no site visits planned.

This is an open-label trial, which means everyone involved, including the participant and the clinical trial doctor, will know the clinical trial treatment the participant has been given.

6. Are there any risks or benefits in taking part in this clinical trial?

The safety or effectiveness of the experimental treatment or use may not be fully known at the time of the trial. Most trials involve some risks to the participant. However, it may not be greater than the risks related to routine medical care or the natural progression of the health condition. People who would like to participate will be told about any risks and benefits of taking part in the clinical trial, as well as any additional procedures, tests, or assessments they will be asked to undergo. All of these will be described in an informed consent document (a document that provides people with the information they need to decide to volunteer for the clinical trial).

Risks associated with the clinical trial drug

Participants may have side effects (an unwanted effect of a drug or medical treatment) from the drug used in this clinical trial. Side effects can be mild to severe, even life-threatening, and vary from person to person. Participants will be closely monitored during the clinical trial; safety assessments will be performed regularly.

Risdiplam

Participants' legal representatives will be told about the known side effects of risdiplam, and possible side effects based on human and laboratory studies or knowledge of similar drugs. Risdiplam has been studied in five studies in healthy subjects and is being studied in four ongoing studies in patients with SMA, in addition to this study. The most frequently reported side effects observed for risdiplam included teething, nasal congestion, fever, loose stools, vomiting, viral infection, constipation, cough and dry skin rash (eczema). Other side effects observed in participants with SMA Type 1, 2 and 3 included lung infections, fever, headache and rashes.

Potential benefits associated with the clinical trial

Participants' health may or may not improve from participation in the clinical trial. Still, the information collected may help other people with similar medical conditions in the future.

Inclusion Criteria:

- Male or female newborn infant aged <20 days at first dose
- Newborn infants with genetic diagnosis of 5q-autosomal recessive SMA or newborn infants identified as positive for SMA via newborn screening or via prenatal testing.
- Gestational age equal to or greater than 37 weeks
- Receiving adequate nutrition and hydration at the time of screening
- Adequately recovered from any acute illness at baseline and considered well enough to participate in the study
- Parent/caregiver is willing to consider nasogastric, nasojejunal, or gastrostomy tube placement during the study to maintain safe hydration, nutrition, and treatment delivery, if recommended by the investigator.

Exclusion Criteria:

- Presence of clinical symptoms or signs consistent with SMA Type 0
- In the opinion of the investigator, inadequate venous or capillary blood access for the study procedures
- Systolic blood pressure or diastolic blood pressure or heart rate abnormalities
- Presence of clinically relevant electrocardiogram (ECG) abnormalities
- The infant (or the person breastfeeding the infant) taking any of the following: any inhibitor of CYP3A4 taken within 2 weeks (or within 5 times the elimination half-life, whichever is longer) prior to dosing, any inducer of CYP3A4 taken within 4 weeks (or within 5 times the elimination half-life, whichever is longer) prior to dosing, and/or use of any multidrug and toxin extrusion (MATE) substrates taken within 2 weeks (or within 5 times the elimination half-life, whichever is longer) prior to dosing
- Concurrent or previous administration of nusinersen or onasemnogene abeparvovec
- Clinically significant abnormalities in laboratory test