Thank you for the reviews

Thank you for the revised manuscript. While again the concept is interesting, the abstract and paper need to reflect that this study only looks at immediate relief, not migraine treatment. There are still many claims and generalizations in the text which are well beyond the scope of this study. As an example, many patients with migraine find short-term relief by placing ice on their scalp. Usually this only helps for a short period of time. But no one would claim that ice is superior to or a replacement for medications, and I would say the same thing for this device study. This article supports the idea that patients may receive immediate relief of migraine pain, but given that you did not measure any longer-term relief or associated symptoms I would not state that this device treats migraine. Specific comments below. There are still statements in the article which are not supported by evidence and which need to be removed.

I have changed “treatment” as “relief” in the manuscript

Again I like to highlight that this is only a pilot study

This is only to see the immediate response only
We did not evaluate the long term side effects of the nasal air suction. We did not evaluate the neuro and vasoactive air molecules in the exhaust samples of paranasal air either. We only used a single measurement of both pain intensity drop and sub-orbital tenderness immediately after the application of nasal air suction. A second study is undergoing to evaluate the safety, side effects and efficacy of a portable low grade air pressure suction device that can be used in a day to day life, adverse effects of paranasal air suction procedure and to assess how long beneficial effects/pain relief last after air suction procedure using multiple measurements over 24 hours.

We have included this under limitations. Our main aim of this study is as a pilot study and this will help us to develop future research and hypothesis. A further study is suggested to compare and evaluate the efficacy and side effects of nasal air suction using multiple measurements over a prolong period. This study findings can also be helpful to develop hypothesis of the pathology of migraine.

There is far too much passive voice in the article.

I have corrected this

It needs to be very clear in the abstract that the primary outcome is 60 second relief. For readers used to more conventional outcomes such as 2 hour pain freedom or relief, this is very confusing.

Methodology of the abstract was corrected as follows.

Since I didn't see anything about dropouts, why were the placebo and treatment arms different (27 vs 23?)

The minimum sample size was 21 for each group. However, 56 were selected including potential dropouts. Out of selected there were dropouts, 1 from the treatment group and 5 from placebo.

Background:

Subcutaneous sumatriptan works faster than 30 minutes.

I have corrected the statement as usually takes more than half an hour to respond.
Remove the statement about "surgical approaches can be used,...". This is an acute migraine study. Surgery is not recommended for migraine prevention in general and is definitely not a treatment for acute migraine.

removed

What does this mean "All these interventions were based on regulation of neuronal impulse that cause migraine headache"??

removed

PLEASE remove that dsNO "in the nasal mucosa is the main cause and the initiative molecule for migraine." What about genetic causes of migraine? What about the many other substances known to trigger migraine?

This is from a hypothesis

I changed the wordings as ‘In this explanation diffused sinus nitric oxide (dsNO) in the nasal mucosa is hypothesized to be one of the main molecules involved in migraine path-physiology.

As previously requested, please remove the statement and reference that surgery "has been proven to reduce or cure migraine headache."

removed

Methods:

Instead of "All subjects were studied only once, after a single migraine headache" I assume you mean "during."

corrected
The statement "none of the subjects were told that this procedure was a therapy for migraine in order to prevent placebo effects of the procedure" seems hard to believe. How did you recruit patients? In a placebo-controlled study (either with drug or placebo or device vs sham) you can and should tell patients the reason for the study.

removed and corrected

A statistical consultant should review the data and statistical approach.

Done

Discussion:

Again please do not suggest that the short-term relief at 60 seconds proves something about migraine pathophysiology such as works by "reducing hypoxia by ventilation of the sinuses."

Removed

The statement "migraine with aura is brought about by more diffusion of NO through the mucosa of the upper respiratory tract in the nasal cavity" is highly debatable. What about the role of genetics, cortical spreading depression, or patent foramen ovale? Is there ANY evidence sinus pathology causes migraine aura?

removed

In the last paragraph you state of this device "It could even prevent complication of migraine with aura such as stroke." Again, what is the evidence for this statement?

removed