

Memorandum of Understanding for the organizations involved in the Open Protocols OPi and OPs

This Memorandum of Understanding (“MoU”) is made between:

- the European Tracking Network (“ETN”);
- Flanders Marine Institute (“VLIZ”); and
- Sonotronics, Inc, WITH commercial intent, referred to as “Sonotronics”.

Whereas, the MoU shall enter into force on the date (MoU Effective Date) of the latest signature by the persons authorized to sign on behalf of a Party, cf. below, and shall remain in full force and effect until terminated as set forth in this MoU. ETN, VLIZ and [the Company/Institute] are hereinafter also jointly referred to as “Parties” and individually a “Party”.

Whereas, ETN is the exclusive owner of the Open Protocols (OP) (as defined below).
Whereas, Sonotronics intends to use the OP within its own products

Whereas, this MoU establishes the basis for a partnership between the Parties and what are the prerequisites to be part of the Open Protocol group (“OP Group”).

1. Steering Committee

The OP steering committee (“OP SC”) consists of representatives from the industry, the ID-allocator (i.e. VLIZ), aquatic animal tracking networks and the scientific community. Each company or institute involved in the OP Group has one representative in the OP SC, with a maximum of 5 representatives from the companies/institutes. The ID allocator has one representative. In addition, at least 3 representatives from different tracking networks and three (3) researchers from the tracking community shall be involved in the OP SC. The chairperson of the OP SC is elected among the representatives and shall always be from the scientific tracking community. Elections will be organized bi-yearly, with a rotation time of maximum five (5) years for each member to ensure continuity and renewal. In case of voting resulting in equal votes, the chairperson’s vote decides. Persons representing the various parties on the OP SC may be evicted if the intentions of the MoU are not complied with. In the case of material breach of the terms and conditions stated in this MoU by the [Company/Institute], the [Company/Institute] shall lose its voting rights in the OP SC and the violation will be disclosed to the public after consultation with the OP SC.

2. Intellectual Property Rights

1. OP was developed by the manufacturers Lotek, Sonotronics and Thelma-Biotel in collaboration with ETN. ETN represents and warrants that all IPR in, to and under the OP have been granted to ETN.
2. As of the MoU Effective Date; OP is defined as 2 protocols: OPi for ID tags (“OPi”) and OPs for sensor tags (“OPs”) utilized for acoustic telemetry, the tracking of aquatic animals.
3. OPi and OPs are 69kHz Pulse Position Modulation protocols.
 - a. A transmit is designed as a burst of pulses.
 - b. Total length of a transmit varies based on the protocol, but is limited to a maximum of 4.2 seconds for OPi and 4.8 seconds for OPs.
 - c. Time between first two pulses is defined as 260ms for OPi and 240ms for OPs.
4. Detailed information on check sum and further protocol definition is only shared with the Sonotronics upon signing and acceding to the MOU.
5. Information on the number of OP IDs available and allocated will be shared with the general public for each of the protocols.

3. Confidentiality

1. During their discussions of future cooperation governed by this MoU, the Parties may disclose confidential information (CI) to each other. CI shall mean confidential knowledge and information of a technical, research or commercial nature, which the Parties may disclose to each other under this MoU, explicitly stating its confidential nature orally or in writing, or where the confidentiality clearly appears from the circumstances. CI may include, but is not limited to, project descriptions, drawings, documents, software, formulas, methods, analysis results and know-how in general ("CI").
2. CI exchanged for the purpose of the Parties' discussion of activities under this MoU may be used solely for that purpose.
3. The Parties shall be bound to maintain confidentiality with respect to CI and shall ensure that no such CI is passed on to any unauthorized third party. The Parties shall ensure that persons involved in the discussions under this MoU assume an identical duty of confidentiality as set forth herein.
4. The duty of confidentiality under this section 3 does not apply to CI which:
 - a. at the time of receipt is or later becomes available to the public other than through the receiving Party's breach of the duty of confidentiality as set forth in this MoU;
 - b. was lawfully in the receiving Party's possession at the time of receipt without any confidentiality restrictions;
 - c. was received from a third party who appeared to be entitled to lawfully disclose such information, or;
 - d. was developed independently of the Parties' discussions under this MoU by the receiving Party.
5. In the event of disagreement between the Parties, the receiving Party has the burden of proof that the information received is comprised by the exceptions listed in this section 3. In the event that CI exchanged under this MoU becomes subject to legislation or executive orders, public law decisions, judgments, awards, etc. requiring the receiving Party to pass on CI in whole or in part, the receiving Party shall inform the disclosing Party hereof without delay. The receiving Party's compliance with any such required transfer of CI shall not constitute any breach of the duty of confidentiality under this MoU.
6. The duty of confidentiality under this MoU terminates three (3) years after termination of the MoU, for whatever reason. However, the Parties acknowledge and recognize that with respect to specific projects, a longer term of the duty of confidentiality may be necessary in order to properly protect a Party's technical knowledge and non-public commercial information.

4. Responsibilities related to ID allocation

1. The data management of the OP is appointed by ETN to VLIZ who runs the database.
2. VLIZ is responsible for the ID allocation to Sonotronics.
3. VLIZ shall be responsible for and ensure that:
 - a. VLIZ has taken reasonable measures to ensure that ID allocation is performed correctly and builds in the necessary quality controls to prevent errors from taking place.
 - b. No duplicate IDs are allocated to Sonotronics.
 - c. VLIZ informs Sonotronics of any errors in the database, copyright infringements or suspected plagiarism by third parties at the earliest convenience.
 - d. The OP database is linked to the ETN database to maximize exchange of information between both systems.
4. The funds generated through the ID-allocation fee are solely used to cover the costs for IT and data management tasks related to the ID-allocation database. In case the funds exceed the costs, the surplus will be allocated to data management and IT tasks related to the ETN data portal.
5. VLIZ may, at any time, decide to terminate the data management related to ID allocation without any financial retributions. In this occasion, VLIZ will hand over the entire database

structure and the data related to a new operator during a transition period of at least three (3) months.

5. Responsibilities of Sonotronics with commercial intentions

1. Sonotronics will not share any CI related to OP with third parties that have not signed and acceded to the MoU, and shall fully comply with the terms and conditions set out in section 3 of this MoU
2. Sonotronics has taken reasonable measures to ensure that the data provided to the OP database is correct.
3. Sonotronics shall inform VLIZ of errors in the OP database, copyright infringements or plagiarism of the OP by third parties without undue delay.
4. Sonotronics will not intentionally manufacture OP transmitters capable of producing IDs of any OP protocol not allocated to [Company/Institute].
5. Sonotronics has taken reasonable measures to avoid consistently overlapping pulse sequences between OP and other PPM protocols.
6. Sonotronics will identify to ETN potentially overlapping sequences with OP.
7. Sonotronics will pay the allocation fee to VLIZ for each ID allocated to [Company/Institute]. Sonotronics will be invoiced every 6 months. Initial prices are listed below. After one (1) year of this MoU entering into force, the prices will be evaluated and adjusted according to real costs incurred.

Initial prices:

2.5€/tag/year is charged for OPi tags with a battery life of up to two years.

1.5€/tag/year is charged for OPi tags with a battery life of more than two years

5€/tag/year is charged for OPs tags with a battery life of up to two years.

3€/tag/year is charged for OPs tags with a battery life of more than two years

8. Sonotronics shall ensure explicit consent from customers on tag metadata transfer to ETN and Sonotronics shall provide the tag metadata assigned to the purchased IDs to the ETN data portal without undue delay and at the latest when tags are delivered to the OP customer.
9. Sonotronics will urge its OP customers to provide the animal metadata to the ETN data portal.

6. Responsibilities of counterparties with no commercial intentions (N/A)

1. [Company/Institute] will not share any CI related to the OP Group with third parties that have not signed and acceded to the MoU, and shall fully comply with the terms and conditions set out in section 3 of this MoU
2. [Company/Institute] will inform VLIZ of errors in the database, copyright infringements or plagiarism by third parties without undue delay.
3. [Company/Institute] will not manufacture transmitters capable of producing IDs of any OP protocol not allocated to [Company/Institute].
4. [Company/Institute] will solely use the CI for non-commercial intentions.

7. Termination

1. Each Party shall be entitled at any time to terminate this MoU and its involvement in the OP Group by giving at least three (3) months prior written notice to the other Parties. All CI provided to Sonotronics under the terms of this MoU remains confidential pursuant to section 3 of this MoU and no OP equipment can be sold from the moment [Company/Institute] informs the OP SC of the decision to withdraw. Customer support related to OP equipment being sold by Sonotronics shall be provided for the lifetime of that OP equipment.
2. If any Party is in breach of section 3, Confidentiality, such Party shall be liable for damages inflicted on the other Parties in accordance with general applicable principles under Belgian law.
3. The Parties may not assign this MoU or any rights or obligations thereunder to any third party without the prior written consent of the other Parties.

8. Settlement of disputes

1. This MoU shall be governed by the laws of Belgium. This applies whether or not international private law and choice of law rules may lead to the application of another country's laws.
2. Should a dispute arise between the Parties in connection with this MoU, including its interpretation and use, the Parties shall enter into negotiations in good faith in order to solve the dispute.
3. If the Parties have been unsuccessful in solving the dispute within thirty (30) calendar days after initiation of negotiations hereof, the dispute shall be settled by arbitration at the Belgian Constitutional Court.

9. Miscellaneous

1. This MoU shall be binding upon, and shall inure to the benefit of, each of the Parties and their permitted successors and assigns.
2. This MoU shall remain valid and enforceable despite the holding of any specific provision to be invalid or unenforceable, and the remaining provisions shall be interpreted to give meaning to the intentions of the Parties hereto without regard to such invalid or unenforceable provisions; provided, however, that the Parties agree to replace such invalid or unenforceable provision with a valid and enforceable provision that will achieve, to the extent possible, the economic, business and other purposes of the invalid or unenforceable provision.
3. Any amendments to this MoU (including amendments to this section) are valid only if made in writing, unless another form is required by mandatory law.

This MoU shall be signed by the authorized signatories of each Party in two counterparts, each of which shall be deemed an original, but each of which together shall constitute one and the same instrument.

Signature & Date

ETN



March 28, 2022

VLIZ



March 29, 2022

Sonotronics



March 25, 2022