

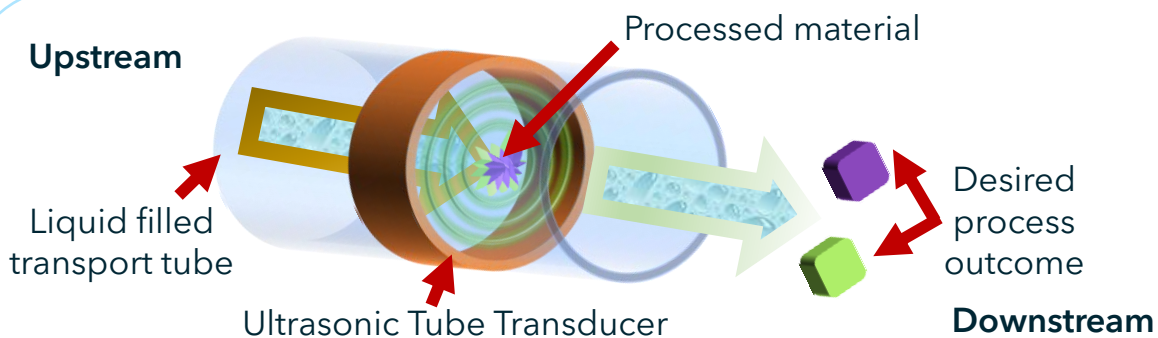
Ultrasonic Tube Transducer



Conventional ultrasound technologies restrict the use of ultrasonic cavitation to small volumes and batch processes.

Our solution, the Ultrasonic Tube Transducer, is a power ultrasound technology that is uniquely suited for continuous flow and scale-up applications.

Its adoption can reduce processing time and energy consumption while minimising operator intervention and exposure risks.



A liquid mixture or solid suspension flows continuously through the Ultrasonic Tube Transducer. All material in the transducer is exposed to high-power ultrasonic cavitation and processed through mechanical and chemical mechanisms.

Benefits

- ✓ Small volume/batch approach is eliminated
- ✓ Cavitation intensity that matches conventional sonotrode technology is distributed over a larger volume
- ✓ Simpler and more scalable than ultrasonic driven baths and vessels
- ✓ Annular geometry is uniquely suited for continuous flow-through operation
- ✓ Manual intervention and exposure is reduced while safety and throughput are increased
- ✓ Effective on a range of liquids, solid suspensions and samples with complex surface structures

Call to action Tell us about your current project using ultrasonic cavitation to collaborate on joint ventures!

Contact

paul.daly@glasgow.ac.uk

react@gla.ac.uk



University
of Glasgow



UK Research
and Innovation