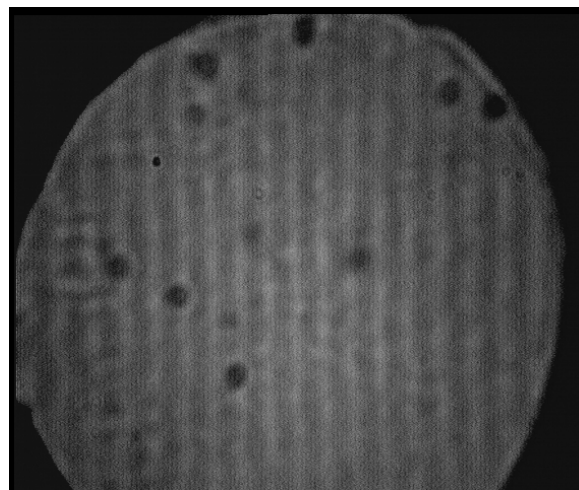
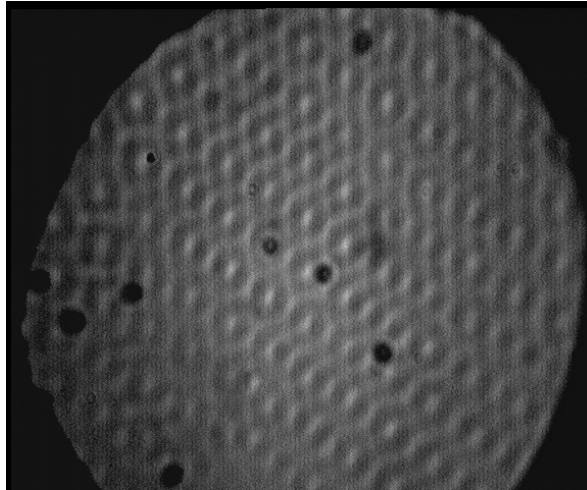




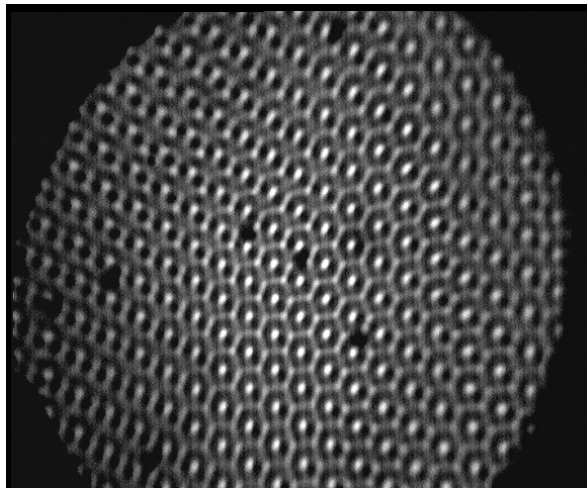
Hexagonal acousto-optic cell.



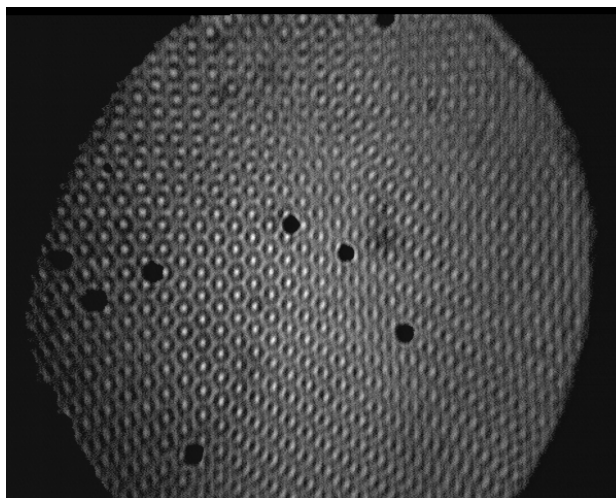
0.87393 MHz



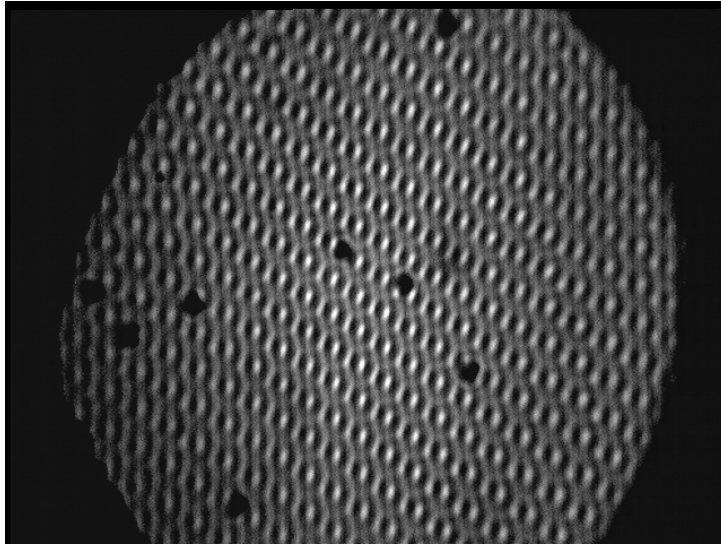
1.241 MHz



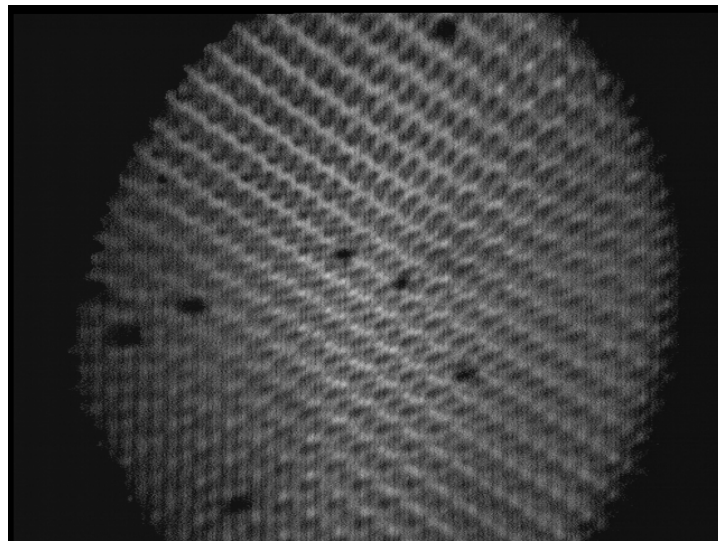
1.833 MHz



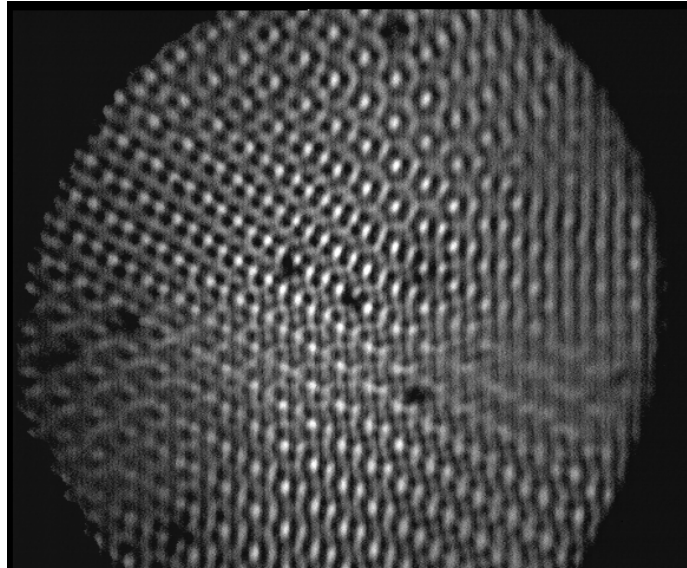
2.855 MHz



2.069 MHz



2.071 MHz



1.955 MHz

This is part of Ohad Axelrod's undergraduate project, to construct and test a hexagonal acousto-optic cell. Help with electronics was also provided by Dr. Dan Spektor. All images were taken at 1V drive at different frequencies as marked. Notice the uneven response of the three standing waves (probably due to poor gluing of the actuators and non-parallelism of the walls) and the occasional reflection of waves from other walls in the hexagonal cell. As is clear, not all resonances had the same quality factor. Collimated white light passed through the cell, and a plane near the exit of the cell was imaged by a lens into a black and white camera. Black spots are on the detector and non-round images arise from a misaligned imaging system between the cell and the camera. No colour effects were discernible with the eye.