James Nizam

Stellar Spectra November 11, 2017 – January 14, 2018

James Nizam ponders cosmic questions minutely. His particulars also have universal associations. He is fascinated by how visual codes reverberate across many material instantiations and how they might be translated across sensory conveyances. The works in *Stellar Spectra* orbit one another, enacting how data is translated and can be exchanged between the visible and audible. The exhibition explores both the immediate and interstellar dimensions of Nizam's works in their reciprocity.

Stellar Spectra examines how we decode sources and origins, whether our own as a species in the cosmos or that of light that reaches us from stars. The photograph *Startrail Sequenced into Morse Code* can be taken as a starting point. Shot on a clear and moonless night, Nizam's 42-minute exposure captures the movement of the stars against the night sky. Always intent to make the artist's and his technology's presence known, he opened and closed the camera's aperture in a way that interrupted the traces of the star's and planet's axial rotation to create a language, the dashes and dots that speak SOS in Morse code. This visual repetition produces human language and suggests communication, but who is contacting whom? Nizam and his camera are not passive receivers. The technology and artist actively translate cosmic information. As we see in Nizam's fascination with reflective surfaces, returned data is also bounced back to the ether.

Nizam's new work builds on powerful precedents in art and science. The co-inventor of Morse code, Samuel Morse, was also a prominent 19th-century American painter. His conventionally picturesque landscape views provided Robert Smithson with a negative example of how to envision our planet in his essay "A Tour of the Monuments of Passaic, New Jersey" (1967). However, where Smithson looked to the ground-level grittiness of Passaic's post-industrial " monuments," Nizam (in kinship with Pythagoras, Kepler, and others who were curious about the sound of the cosmos) looks up to the stars and planets. He sonified *Startrail Sequenced into Morse Code* using image-to-sound conversion software to transform what we see into audible sound waves. The resulting sound work—*Score*—accentuates the equivalences in data, medium, and scale that Nizam wants to convey across this exhibition. Twinned with the photograph's exposure time, *Score* is also 42' in duration—too long to play on one side of a 12" vinyl record. The solution? To cut the master at 66 rpm to compress the duration into 21 minutes and then play it at 16 rpm on the purpose-built turntable that we see in this room. This process expands the whole back to 42', which we hear on a continuous loop. A synecdoche for the exhibition as a whole, his device compresses and expands time simultaneously.

Because Nizam's individual works are discrete yet also interrelated on an essential plane, we are encouraged to move from one to another and back again. Nizam's *Disc*—comprising a polished nickel stamper, the plate used used to impress grooves into vinyl records—not only transcribes stellar light but also alludes to a famous attempt to communicate with the cosmos: the Golden Record, which Carl Sagan and his colleagues created as a time-capsule record of Earth's sounds and cultures. Launched into our solar system aboard Voyager 1 and 2 in 1977, the Golden Record awaits an audience, but the spacecraft are still communicating with Earth. The first track on the Golden Record's "Sounds of the Earth" section

is American composer Laurie Spiegel's realization of Kepler's music of the spheres, described in his book *Harmonices Mundi* (1619), another inspiration for Nizam's project.

Stellar Spectra brings imponderably old starlight into our present experience. Correspondences occur across extreme distances as well as intimately, among media. For example, Nizam's three photographs of starbursts in a limestone quarry on Texada Island, near Vancouver, link in myriad ways with *Startrail Sequenced into Morse Code*. Suggesting sound but in itself quietly reflective in all senses, the stamper of *Disc*, which is the "father" of the record playing on the phonograph, sits on a nearby plinth. Where the grooves of vinyl records display micro-topographies, these photographs show a large-scale and decidedly anthropocentric landscape onto whose unnatural plateaus Nizam manoeuvered the reflective stamper to align with the sun's light, capturing yet also creating the starbursts we see in the photos shown here. The solar scale that the photographs record participates in the endless cycle in which humans exchange data with the universe. The sun is both source and receiver of this light.

Nizam photographs starlight. He presses it into vinyl and takes the stamper and turns it back into a mine of starlight in the quarry. With *Spindle*, he carves this ephemeral emanation into a sculptural form, as if to hold it for our inspection. The source for the spindle's turned profile comes from the sound waves produced by Spiegel's 11-minute composition *Kepler's Harmony of the Worlds* (1977). *Spindle* is thus a recollective homage to Spiegel and Kepler that resonates with other works in the exhibition.

The works in Nizam's exhibition extend the metaphorical, philosophical, and technological experimentation with the registration and redeployment of light pioneered in the 19th century—particularly the heliograph, a photographic device that allows sunlight to "write" onto a mirrored surface, which is then manipulated to bounce a message in Morse code to a distant viewer, and Alexander Graham Bell's remarkable photophone of 1880, which conveys sound on light beams. Bell's brainchild projects the voice toward a mirror, which in turn transmits soundwaves toward a second mirror, which then decodes the data back into a human voice. No electricity needed. *Stellar Spectra* as a whole stages similar relays of light and sound. In the room with *Spindle*, for example, are several *StarLight Drawings*, summative works that push Nizam's translations of light into abstraction. As in *Startrail Sequenced into Morse Code*, Nizam's camera receives the faint light from the night sky and again interrupts the initially mute and regular progressions by opening and closing the aperture. Here the artist has added mechanically controlled lenses to his camera. The imprint of his movements—stopping and starting and now moving in and out—appear on the photograph as waveforms travelling into or out of space, the handwork of the artist and the cosmos. The many permutations that compose *Stellar Spectra* suggest that even in the complexities of the interrelationships we witness, there is a fundamental code for the makeup of the universe that we can fleetingly perceive and translate.

Mark A. Cheetham 2017

Mark A. Cheetham has published extensively on historiography and art theory, abstract, art and art in Canada. A Guggenheim Fellow, he has also received writing and curatorial awards from the College Art Association of America and the Ontario Assocation of Art Galleries. He is a professor of art history at the University of Toronto.