Poetry Inspired, Physics Driven, Experimental Animation

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1. INTRODUCTION

"When the serenity of the great void and the fury of the cosmos intersect, when quantum mechanics and relativity come face to face, tiptoe and waddle, skitter and scuttle, whirl and whisk, behold: The Prophecy of the Sky Pacers is now! There is no escaping our cosmic destiny."

"Glints of light, passing of shadows, the choreography of perpetual existence sets the stage for this Delphian ballet. The impenetrable flow of life's rhythms, their Sisyphean inceptions and cessations are punctuated with eternity's ephemeral modulations. The transmigration has begun, the beginning of the end, the end of the beginning."

Above are two descriptions of some of the works we will look examine. The essence of the presentation is to demonstrate how two seemingly opposite approaches, a humanistic, poetic approach and that of digital imaging technology can be integrated in the creation of new works of art.

2. THE POETICS OF DIGITAL VISUALISATION.

For the last 5 years composer Jing Wang and I have been collaborating on a series of experimental electronic visualisations. The work falls under the genres of "Visual Music" or "Experimental Animation." One of our less luminous objectives has been to bring a more organic and natural feel to our digital based creative work. The field of electronic visualisation has a strong inclination towards mathematics. Geometric forms and movements are common place.

In an attempt to move past these stereotypes, we have attempted to incorporate the use of poetry as inspiration for both the form and structure of our

work. For example, our visualisation "Sky Pacers" was partially inspired by an ancient Chinese star catalogue in the form of a poem specifying the names of stars, "The Song of the Sky Pacers". The ancient Chinese stone carvings representing the constellations were also inspirational in our deliberations. Another line of poetry that influenced the work came from William Blake's poem "The Tyger".

*"When the stars threw down their spears and
watered heaven with their tears."*

Emily Dickinson's "The First Day's Night Had Come" creates an inspiring poetic image for another section of the piece:

*"She said her Strings were snapt—
Her Bow—to Atoms blown—
And so to mend her—gave me work
Until another Morn—"*

Robert Frost's epigram "Pertinax," contains the following illuminating lines:

*Let chaos storm!
Let cloud shapes swarm!
I wait for form.*

Once these poetic depictions are gathered and internalised, our process is to let them percolate while filtering the feelings they evoke through some highly sophisticated software. Both 2D and 3D animation techniques along with physics based particle systems are employed with the hope of capturing the organic nature of the poetic imagery. The ability to work with gravity, wind, air, viscosity and turbulence as creative tools has opened up new areas of exploration for us.

Figure 1: Still from: "Sky Pacers".

Figure 2: Still from: "Ouroboros".

We are currently working on a new piece titled "Uriel" based on a poem of the same name by the transcendentalist poet Ralph Waldo Emerson. In this work, we are not only inspired by the poetic imagery created in the work but the "dramatic arc" and form/structure of the poem as well. One of the more poignant sections follows:

*"With a look that solved the sphere
and stirred the devils everywhere,
Gave his sentiment divine
Against the being of a line."*