

+++

# Gooney Ducks and Naked Physicists

---

## Part XV The Babel Unraveled

D. and S. Birks  
April 2016

Editing contributions by Daniel Birks.

Abstract: An allegory of modern science.

## Part XV

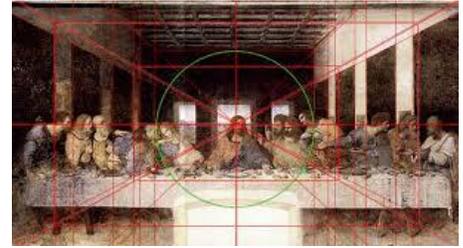
*When the rain blotted out the hills, and...every tree sang the Song of the Rushing Wind;  
when the lightning ran zigzag all over the sky and thunder jarred the house—*

I can still recall, as a young lad, the first time I heard tell of Descartes:  
Who could ever forget that legendary story of a young soldier, lying beneath the cold  
November night, having an epiphany—a dream of universalizing science by unifying all  
mathematics—a dream of a science founded on the certainty of math.

Dreams to remember...the Cartesian dreams? You betcha!

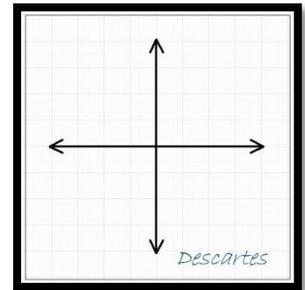
Imagine: taking all the shattered and scattered, unwieldy pieces of science and math and  
coming up with one mathematical framework—one “thing”—to pull it all together!  
To see what’s already been written and then go beyond, to find a connection of everything!

The Cartesian grid? The right-angle axis?  
Now there’s a vision to rival any *Garden of Delight*,  
one so beautiful in its simplicity, it leaves the world of  
science standing speechless and stupefied in abject  
admiration!



I thought Leonardo, Donatello, Michelangelo, Raphael, and Botticelli  
had a corner on the science of beauty. But stand aside, fellas!  
Descartes outstrips y’all! He gets right down to it—he peels back the  
vener and dares to bare the very soul of mathematics!

Talk about form following function! Firmitas, utilitas, venustas?  
It’s all there: solid, useful, and beautiful!



Holy Toledo, Batman! I think I just had my own epiphany!  
This could be the “unrecognized” masterpiece of all time: *The Portrait of Mathematics!*  
And it’s so universal, so user-friendly, so simple! Even I can draw it!

Wow! The right-angle renaissance!  
The true connection of science, art, beauty, line, proportion, and perspective!  
I can even see it hanging in the Louvre, right there in the Salle Descartes! Why not?

Yeah, Descartes sure left his mark on history!  
He signed his name with a big, giant X...Xorro! *Xavier Xescartes! Monsieur X!*

## Twenty-seven

Errant knights, fair maidens, enchanted forests, daring deeds, and romantic quests...

Uh huh, once upon a time, in days of yore, I was so sure mathematics was a done deal, that all the dragons had been slain—all the kinks worked out long ago!

Like all the other students, I took the classes, studied hard, and was reasonably hip, hep, and *au fait* with the math game! It was all skookum—copacetic!

Yet, I must admit, I always had this one, niggling doubt.

If all the problems are already solved and the answers right there in the back of the book, what's the deal, McNeal? Why's everybody doing the same equations over and over?

Yep, if you've already been to Ivar's, and your belly's full of fish, why keep puttin' out the bait?

So, the big philosophical question: Why sharpen your number two pencil?

What's the real unsolved problem? What's the reason behind all this study of mathematics?

“One word: plastics”?... No, communication! ☺

It's gotta be about having a basis for common understanding!

Yeah, try convincing everybody to study Latin or Esperanto? Good luck with that! No way!

But get everybody looking at math the same way—they'll never, ever, in a million years, realize they're all learning the same language!

Aha! So Descartes' dream—X marks the spot? Of course!

What better way to universalize science than by universalizing the scientific language!

*Universalized Language of Math = Universalized Science*

Kudos to you Descartes, you sly dog, you! Talk about your subtle, intellectual subtext!

Talk about knowledge being the connection of ideas! Imagine, just by crossing two lines at a right angle, you brought the whole scientific world together!

Your masterpiece of math—it's really a masterpiece of communication!

The math itself is the new international language!

Oh ho! The Gorn speaks? No need to scan for gamma brainwave frequencies, Mr. Spock!

Descartes already created the ultimate intellectual, common denominator—a mathematical symbol as a universal translator! The grid/axis—a magical, mathematical “town square” where everybody can come together and speak that same inner language we all have in common!

Yeah, step onto the grid and voila! We all speak Cartesian!

Wow! Everyone speaking the same language again?

Beam me up, Scotty! And recheck your coordinates! It might be a good time to recalibrate the Heisenberg compensator, 'cause I think I've just been transported back to Babel!

*Before me, I see a city rising out of the plain. As the clouds of haze and smoke begin to clear, I see four towers—pyramids—and the valley floor awash in a seething mass of humanity and confusion. Descending into the tumult, disoriented, I push my way through the crush and din to the base of one of the pyramids and climb until standing on its bare, windblown summit. There, on the parapet, a long forgotten standard lies discarded. As I struggle to raise and wave the unwieldy, heavy banner—as it unfurls, streaming out in a long pennant into the wind—I hear faint strains of music rise in crescendo and the crowds begin to chant...Ay oh whey oh!*

Walk like an Egyptian! Of course!

King Tut, Nefertiti, Cleopatra, Champollion, Carter, *Chasing Mummies*, and Nile crocodiles?

Man, why didn't I see it before?

Silent, unfathomable, *riddle wrapped in a mystery, inside an enigma?*

Toss me the bullwhip and hat, Dr. Jones! I think I just solved it!

The mystery of the Great Pyramid? It's not a mystery at all; it's the answer!

Yeah, solve the puzzle in four letters? Gimme an "M" Vanna! No sweat! M-A-T-H!

Holy felucca! Camels, tombs, cartouches, Pharaoh's gold, scarabaeidae, hookah bars, and Starbucks? Don't get distracted! The real treasure—the answer and truth—is right there in plain sight, shouting out in a voice so loud it's a wonder the sphinx hasn't gone deaf!

*"Hey, hey look at me! Look at my geometry! All this time I've been standing here trying to tell you—math is the key! It's all about the math!"*

A time capsule left by the Ancients? A message in a ginormous stone bottle? The Great pyramid is the great proof! God may have confused our speech at Babel, but our common language?

We didn't lose it. It's always been there! From Adam to Noah, to Imhotep, Thales, Pythagoras, Euclid, Galileo, Descartes, Newton—since the beginning—our constant connection between the past, present, and future has always been the timeless, universal

language: math!



*The Pyramid = Math*

Holy Babylon, Batman! I can just see the cover of *Archaeology* magazine:

CAIRO, EGYPT—THE COMMON LANGUAGE OF HUMANKIND UNEARTHED!  
THE TOWER OF UN-BABEL DISCOVERED!

Can ya “dig” it? Or maybe a feature in *Anthropology Now*:

THE BABEL UNRAVELED! WAS MATH MAN’S FIRST LANGUAGE?

Wait a minute! I’m thinking too small! Years ago, I remember reading theories of Miguel Covarrubias (in his book *The Eagle, the Jaguar, and the Serpent*) that attempted to tie together all the peoples of the Pacific Islands and the Americas through primitive art.

But now I can see the pyramid connection!

Yeah, pyramid power! Talk about a rumble from the jungle!

From A to Z, from the Aztecs to the Ziggurat of Ur and everything in between:

from Giza to Mexico City, from the pyramids of Egypt to those of the Maya, the Olmec, the Purépechas, and the Incas, from the Tomb of the General in China, to Rapa Iti in Polynesia— it's like the pyramids are shouting in stereo:

*“What do we all have in common? M-a-t-h!”*

And if I think about it, our entire constructed and material culture displays this common language of humanity! Crossing all boundaries of distance, culture, and time—from Machu Picchu, to St. James Cathedral over on First Hill, to the onion domes of Saint Basil’s, the Sistine Chapel, the Taj Mahal, and the Hagia Sophia, to Solomon’s’ temple, Abraham’s Ka’aba, and Noah’s Ark—it’s only logical: the great anthropological and archeological tie between them all—the one connecting factor (other than God, of course)—is the math!

What a breakthrough!

Is this the greatest archaeological discovery in history? I wonder...how do I lay claim to that? It’s like that cheesy line from the classic Egyptologist movie “Valley of the Kings”:

*Every time I dig up something from the past, it gives more meaning to the future.*

“You be you and I’ll be me”? Scientific stalemate or intellectual détente?

Au contraire, mon frère: Now we can work together and go forward again!

We all have a common language! Math!