THE UNIVERSAL FORCE OF TIME

The Fine Structure Constant — DNA Three Parameters

The three forms of the DNA double helix turn at 125/12, 10π²/9 and 12 base pairs, and their product is exactly ten over α — the gear between the celestial and atomic registers of time, reached by four independent roads

Stephen Daubney · The Daubney Foundation · 2026 · Rev 4

Tau (T) is the living fabric of time itself — the sole substance of which all physical reality is composed. It is generated by the Sun, as by every star for its own system, and flows outward in the form of the DNA double helix, creating matter, which it deposits at nodal points — the planets — and creating life. Every particle, force, wavelength and conscious experience is a structured configuration of T-flow. The conservation law dΣT = 0 governs all change: T is never created or destroyed at a node, only redistributed.

THE VALUE, NUMBER FIRST

137.077838904018870

$1/\alpha$ ($5^3 \cdot \pi^2/3^2 = 125\pi^2/9$) = (10.41666… × 10.96622… × 12) ÷ 10 — the B, A and Z turns of the DNA helix (125/12 × 10π²/9 × 12 = 1250π²/9)

α = **0.007295125222** ($3^2/(5^3 \cdot \pi^2)$) · Mercury's year ÷ α = 12,056.327 = 125 × the Faraday · light × α = 3^7 km/s

ABSTRACT

For a hundred years one number has sat at the heart of physics without an explanation. It measures how strongly light takes hold of matter, it has no units, and it is close to one over 137. Pauli is said to have asked, near the end, what it meant. Feynman called it one of the greatest damn mysteries of physics. It is called the fine structure constant, α. This paper sets out the position of the Universal Force of Time: **α is not a constant of electromagnetism, because there is no separate electromagnetic force. It is the gear ratio between two registers of time — and the molecule of life is wound to it.**

The work is built number first, with each lattice form placed behind its number. The value is

- **$1/\alpha = 137.077838904018870$ ($5^3 \cdot \pi^2/3^2$)**, and α = **0.007295125222248320 ($3^2/(5^3 \cdot \pi^2)$)**.

From that value the paper:

- shows that the **three forms of the DNA double helix** — B, A and Z — turn at **10.41666… (125/12), 10.96622… (10π²/9) and 12 base pairs a turn**, and that **their three turns multiply to 1370.778389 (1250π²/9), exactly ten over α**;
- shows that the three forms are three registers with three jobs — **B the existence form on G1, A the reading form on G2, Z the return form on G0** — that B × Z = 125 with no π, and that only the reading form carries the π that reaches across to light;
- sets out the **A form** as a set of addresses: its diameter **23.0258887575 Å ($5^6/(2^3 \cdot 3^3 \cdot \pi)$)**, its pitch **36.8414220120 Å ($5^5/(3^3 \cdot \pi)$)** — the same digits as Mercury's rotation seed — the pitch-to-diameter ratio **8/5**, and its twist **32.8280635° (324/π²)**, which in radians is the veil divided by a hundred;
- gives **three more roads to the same number**: the Moho × the veil × 2; the speed of light × α, which steps down to **3^7 km/s, 1312.2 kJ/mol and 13.6048896 eV**; and Mercury's G2 year ÷ α, which is **$5^9/(2 \cdot 3^4)$, one hundred and twenty-five times the Faraday**;

- reads α as **the register bridge**: the gear by which T steps from the orbit of Mercury to the orbit of an electron, which is why it has no units;
- gives the electron's anomaly a lattice form, **0.0011610552 ($3^2/(2\cdot5^3\cdot\pi^3)$)**;
- and corrects the first versions, which compared the value with a measured figure in parts per million and cited a helix pitch carrying the prime 17.

It closes with what stands, what is open, the conditions that would break it, and an appendix from which every number can be rebuilt. Every figure has been recomputed from its lattice form at forty digits, π carried as a symbol.

THE FORMULAS OF THIS PAPER, NUMBER FIRST

Every result in this paper is carried by one of the formulas below, each written with the number first and the lattice form in brackets behind. Each is worked in full in the part named beside it.

> **FORMULA A1** **THE VALUE** **Part One**
> 137.077838904018870 ($5^3\cdot\pi^2/3^2$) α = 0.007295125222248320 ($3^2/(5^3\cdot\pi^2)$)
>
> **FORMULA A2** **THE THREE TURNS OF THE HELIX** **Part Two**
> B 10.41666666666666667 ($5^3/(2^2\cdot3)$) A 10.96622711232150958 ($2\cdot5\cdot\pi^2/3^2$) Z 12 ($2^2\cdot3$)
>
> **FORMULA A3** **THEY MULTIPLY TO TEN OVER ALPHA** **Part Two**
> 10.41666... x 10.96622... x 12 = 1370.77838904018870 ($1250\pi^2/9$ = 10/α)
>
> **FORMULA A4** **THE THREE JOBS CLOSE** **Part Three**
> B x Z = 125 (5^3, no π) 1/α / A = 12.5 ($5^2/2$)
>
> **FORMULA A5** **THE READING FORM, MEASURED** **Part Four**
> diameter 23.0258887575 ($5^6/(2^3\cdot3^3\cdot\pi)$) pitch 36.8414220120 ($5^5/(3^3\cdot\pi)$) pitch/diameter 8/5
> twist 32.8280635001 degrees ($324/\pi^2$) = 0.5729577951 radians (9/(5π))
>
> **FORMULA A6** **THE MOHO ROAD** **Part Five**
> 6366.1977236758 (20000/π) x 57.2957795131 (180/π) x 2 = 729512.522... -> α
>
> **FORMULA A7** **THE LIGHT ROAD** **Part Five**
> 299,789,233.6830892680 x α = 2,187,000 m/s (3^7 km/s) x 3/5 -> 1312.2 ($3^8/5$) -> 13.6048896 eV
>
> **FORMULA A8** **THE MERCURY ROAD** **Part Five**
> 87.95241635619598 days ($5^6/(2\cdot3^2\cdot\pi^2)$) / α = 12,056.327160493827 ($5^9/(2\cdot3^4)$) = 125 x the Faraday
>
> **FORMULA A10** **THE ELECTRON'S ANOMALY** **Part Seven**
> 0.001161055239595182 ($3^2/(2\cdot5^3\cdot\pi^3)$)

THE TERMS THIS PAPER USES

An address. Every value in this framework is a product of powers of 2, 3, 5 and π, and nothing else. That product is the value's address. A number that needs any other prime — 7, 11, 17 — is not on the lattice.

The π-degree. The degree of an address is the power of π it carries, and the degree says what kind of thing the value is. An even degree is a **room** — a state, a thing that sits; it pairs, like a pair of circles. An odd degree is a **road** — a transport, a thing that carries; it is the unpaired circle. A half degree is a **door** — a source, which squares to a whole address.

A register. A register is a level at which T is read — the celestial register of the Sun and planets, the atomic register of the proton and electron, the biological register of DNA. The names G0, G1 and G2 mark neighbouring registers. **The G-bond step** is the smallest structural step between adjacent faces of one value, **1.000090150603356201 ($5^{10}/(2^4\cdot3^9\cdot\pi^3)$)** — the amount by which a G1 face is multiplied to give its G2 face.

The free decade. Moving a value by a power of ten costs nothing on the lattice, because ten is two times five: the move shifts twos and fives together and changes nothing else. That is why 137.0778... and 1370.778... are one address.

The veil. The veil is 180/π = 57.29577951308232, the number that turns radians into degrees.

The day, 864. 864 is the day: 86,400 seconds in a day, written at its decade. It is the ground state of the DNA helix.

The helical turn. A turn is one revolution of the helix. The helical turn is the step from one revolution to the next, **1.004693930041152263 ($5^6/(2^6 \cdot 3^5)$)**.

The 612 step and the 703 step. The 612 step is helium divided by four, **1.000612842467910952 ($2^9 \cdot 3^5 \cdot \pi/5^8$)**; the 703 step is the span of hydrogen's ionisation faces end to end, **1.000703048319385397 ($800/(81 \cdot \pi^2)$)**. They are named so that the reader meets the family of small steps of which the G-bond step is the smallest.

Free fall. Free fall is not the acceleration of a body pulled by a force; it is the correction that tops a rotation up to a full day, one value with the speed of light read in a different unit of time: **9.817477042468104 ($5^2 \cdot \pi/2^3$)**.

The radial mass. A radial mass is a mass spread over a radius rather than held at a point; dividing a node mass by 9375 turns it into a radius.

Why a value can be carried from one kind of quantity to another. An energy is a count of T, and the unit is a choice of clock: a joule is energy counted in seconds, a kilojoule per mole the same energy counted in minutes, an electron-volt the same energy in the spin-orbit register. A length, an angle, a time and a number of base pairs can likewise be one count read at different registers.

How the numbers were checked. No value in this paper was found by a search, so no statistical test is needed to judge it. A p-value answers the question "how often would I see a landing this close if the thing were not real?"; a control is a set of decoys built to resemble the real values, run through the same search to find out how often chance alone lands; a standard deviation is the typical distance of a measurement from its mean, the spread of the ruler. Each matters when a result is found by looking. Every result here is an exact identity worked from its address, forwards and backwards.

PART ONE — THE NUMBER NOBODY COULD EXPLAIN

A pure number at the heart of physics

Most numbers in physics carry units: metres, seconds, kilograms. Change the units and the number changes. A handful do not, and α is the most famous of them. It sets how strongly an electron and light take hold of one another; it fixes the spacing of the fine lines into which atomic spectra split; and because it carries no units, it would read the same to any civilisation anywhere, whatever rulers and clocks they used. That is exactly why it has been so troubling. A number with no units cannot be a matter of convention. It has to come from somewhere — and for a century no one has been able to say where.

Where the name comes from

The number was introduced in 1916 by Arnold Sommerfeld, who was trying to explain why the lines of hydrogen's spectrum, looked at closely enough, are not single lines but tight pairs and triplets — the fine structure that gives the constant its name. Sommerfeld found that the splitting was governed by one small pure number. In the century since, the same number has turned up wherever light and matter meet: in the colour of a hot gas, in the magnetism of a single electron, in the shift between energy levels that the old theory said should be equal. Each time it was measured more finely; each time it remained unexplained. Physicists have proposed formulas built from π, from powers of two and three, from the geometry of imaginary spaces. None of them was tied to anything else in nature.

The Universal Force of Time does not offer one more formula of that kind. It offers a reason: α is the gear between two registers of the one substance, T, and a gear can be read anywhere the two registers meet. The test of that reason is not a formula. It is whether the same number appears, exactly, in places that have nothing to do with one another — and whether it appears in the molecule that the flow of time builds at the biological register.

The value the framework holds

```
FORMULA A1      THE VALUE
    1/α   =   137.077838904018869706          ( 5³·π²/3²  =  125π²/9 )
    α     =   0.007295125222248319544         ( 3²/(5³·π²) )
```

The framework's value is a short address: five cubed, times π squared, over three squared. It carries an even power of π — a room, a state. **It is the value; it is not an approximation to some other value.** This paper does not compare it with the figure printed in physics tables, because that figure is built from science's own measurements of the charge and the speed of light, which are not on the lattice. What matters is whether the framework's value is

reached, independently and exactly, by roads that have nothing to do with one another. Five such roads follow, and the first is the one in the title.

PART TWO — THE THREE TURNS OF THE HELIX

Three forms of one molecule

DNA is not one shape. The double helix that carries the genes of every living thing takes three well-established forms. **B-DNA** is the form found in living cells, the one in the textbook picture. **A-DNA** is a shorter, wider helix that DNA adopts when it is drier, and the form in which RNA and DNA pair when a gene is read. **Z-DNA** is a zig-zag helix that winds the other way, to the left. Each form completes a full turn of the helix in a different number of base pairs.

```
FORMULA A2     THE THREE TURNS OF THE HELIX
    B-DNA     10.41666666666666666667 base pairs a turn        ( 5³/(2²·3)  =  125/12 )
    A-DNA     10.96622711232150957648 base pairs a turn        ( 2·5·π²/3²  =  10π²/9 )
    Z-DNA     12 base pairs a turn                             ( 2²·3 )
```

Each is exact, and a reader can check each in two lines by closing the circle. The B form steps 34.56° per base pair, and 34.56 × 125/12 = 360. The A form steps 32.8280635001174° per base pair — 324/π² — and that × 10π²/9 = 360. The Z form steps 30° per base pair, and 30 × 12 = 360. **Three forms, three exact closures, and not one of them a rounded figure.**

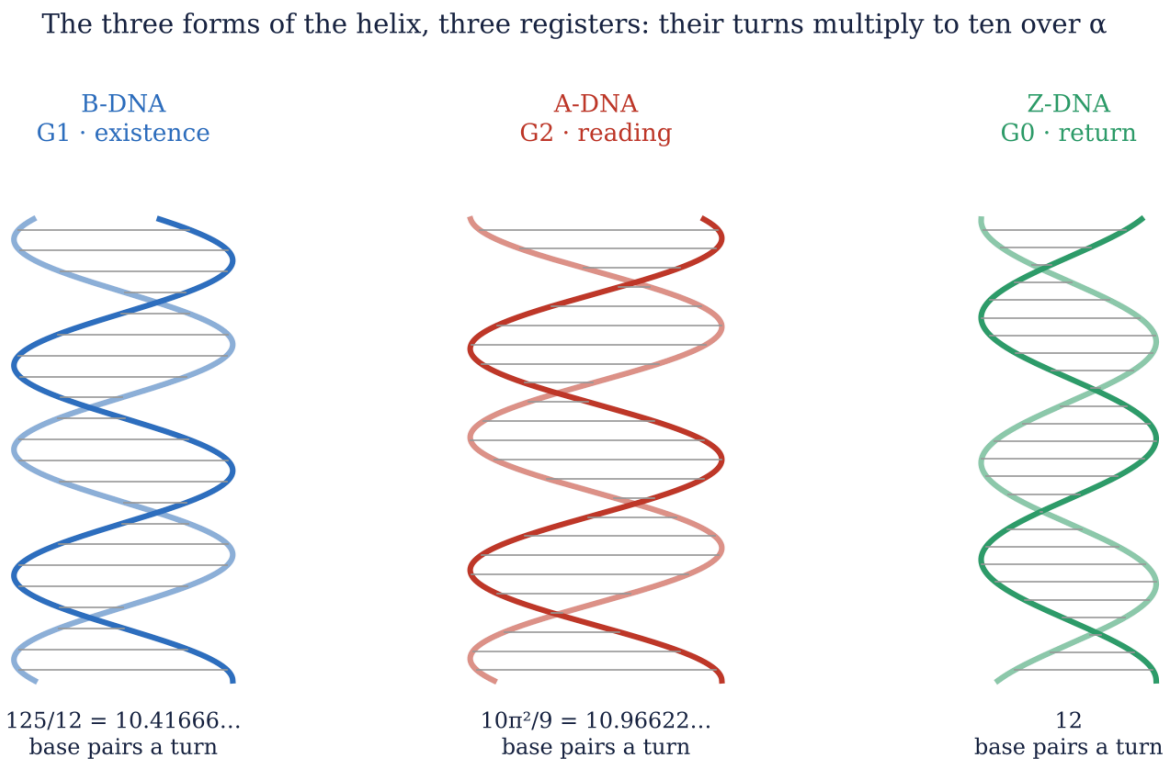


Figure 1 — **The three forms of the helix.** B-DNA turns once in 125/12 base pairs, A-DNA in 10π²/9, Z-DNA — winding the other way — in 12. Each closes the circle exactly.

The three turns multiply to ten over α

Now multiply the three turns together.

```
FORMULA A3     THEY MULTIPLY TO TEN OVER ALPHA
    10.41666666666666667  x  10.96622711232150958  x  12   =   1370.77838904018869706
    ( 5³/(2²·3) )            ( 2·5·π²/3² )                    ( 2·5⁴·π²/3²  =  1250π²/9 )

    1370.77838904018869706  /  10   =   137.077838904018869706   =   1/α
```

The product of the three turns of the DNA helix is exactly ten times 1/α. The molecule of life, taken in all three of its forms, is wound to the number that sets how light takes hold of matter. Nothing was fitted. Each turn is fixed by closing the circle, and the product follows.

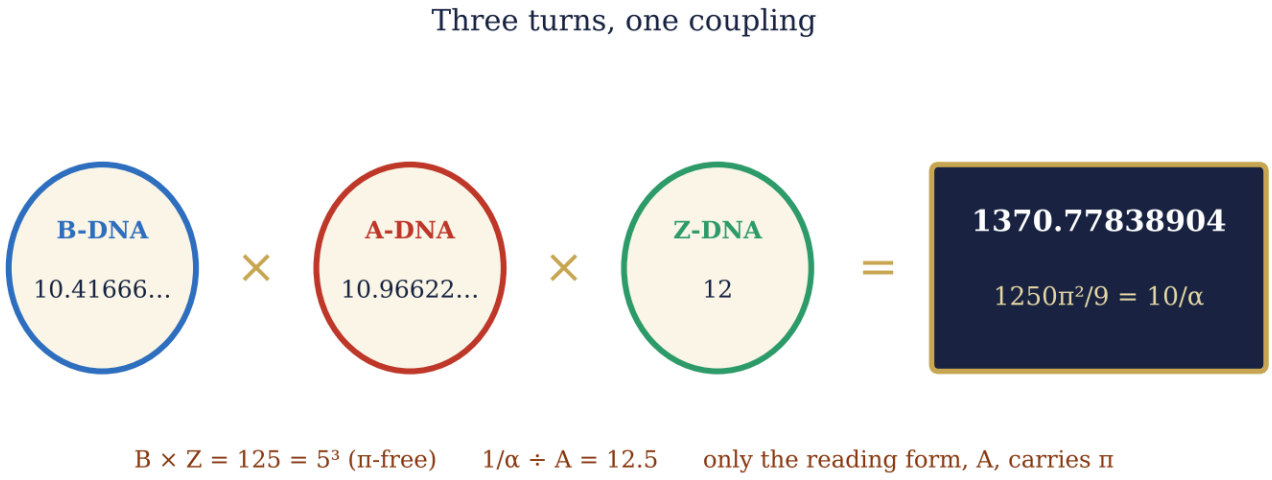


Figure 2 — Three turns, one coupling. B × A × Z = 10.41666... × 10.96622... × 12 = 1370.77838904 = 1250π²/9 = 10/α. B × Z alone is 125, with no π; the reading form A carries the π.

PART THREE — THREE REGISTERS, THREE JOBS

Existence, reading and return

The three forms are not three accidents of chemistry. In this framework they are the same helix on three registers, each doing a different job.

```
FORMULA A4     THE THREE JOBS CLOSE
    B-DNA    G1    EXISTENCE    125/12          π-free          the form that holds the living address
    A-DNA    G2    READING      10π²/9          π +2, a room    the form in which a gene is read
    Z-DNA    G0    RETURN       12              π-free          the form that turns back

    B x Z        =   125    ( 5³ )         existence times return: a pure power of five, no π
    1/α / A      =   12.5   ( 5²/2 )       the coupling over the reading form: a plain fraction
```

Existence times return is a pure power of five. The reading form is the only one of the three that carries a π — and that is exactly why it, and not the other two, is the one that reaches across to light. Reading a gene is an exchange between the molecule and the flow of T; holding it and returning it are not. The π that the reading form carries is the π in α.

The reading form is Face C

The A form's turn, 10.96622711232150958, has been met before. **It is the digits of Face C of the Rydberg, 10,966,227.11232150958 ($10^7\pi^2/9$)** — the face whose series limit, carried through the veil, is the Moho. The form in which DNA is read and the face of hydrogen's spectrum that reaches the seam at the top of the Earth's mantle are one address.

PART FOUR — THE READING FORM, MEASURED

Every measure of the A form is an address.

```
FORMULA A5     THE READING FORM, MEASURED
    diameter             23.02588875750800575 Å         ( 5⁶/(2³·3³·π) )
    pitch                36.84142201201280921 Å         ( 5⁵/(3³·π) )
    pitch / diameter     1.6                            ( 8/5 )
    twist per step       32.82806350011743795°          ( 324/π² )
    the same in radians  0.5729577951308232088          ( 9/(5π)  =  the veil / 100 )
```

Three of these deserve a second look. **The pitch, 36.8414220120, carries the same digits as Mercury's rotation seed, 368.4142201201** — the value that, multiplied by the twenty-one centimetre line of hydrogen, gives 7776 = 6^5. The length of one turn of the reading helix and the seed of the innermost planet's spin are one address. **The pitch over the diameter is 8/5**, one of the four Fibonacci ratios the lattice keeps. And **the twist in radians is the veil divided by a hundred** — the number that turns a circle into degrees, appearing as the angle by which the reading helix turns from one letter to the next.

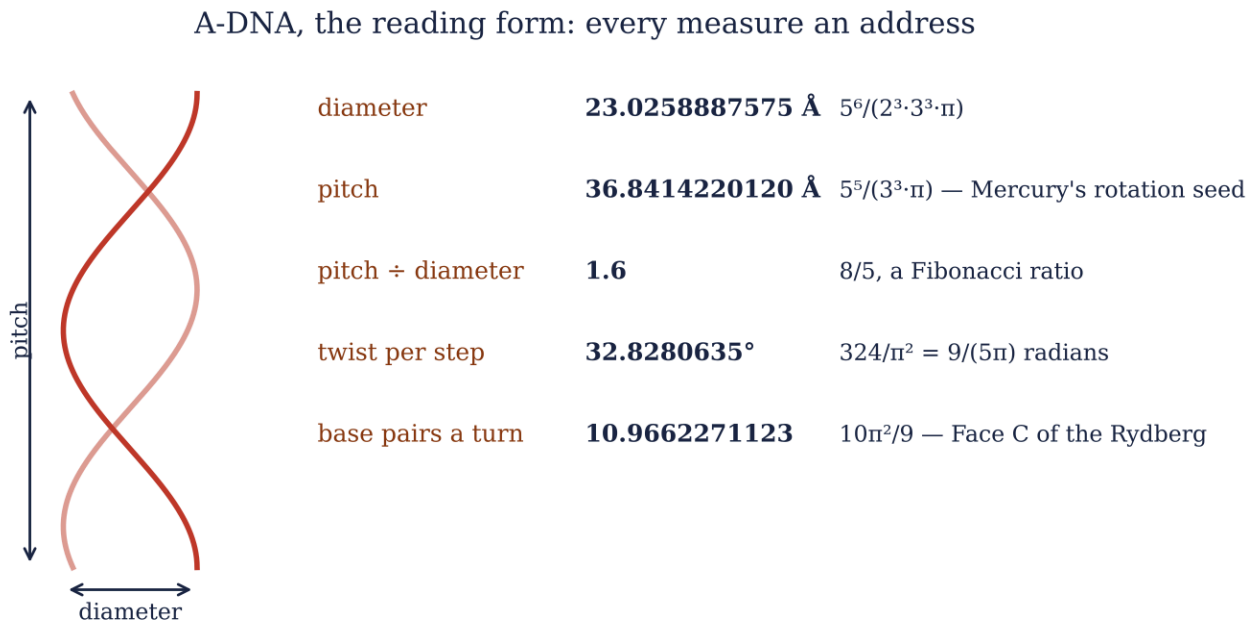


Figure 3 — **A-DNA, the reading form.** Diameter $5^6/(2^3\cdot3^3\cdot\pi)$, pitch $5^5/(3^3\cdot\pi)$ — Mercury's rotation seed — pitch over diameter 8/5, twist $324/\pi^2$ degrees, and $10\pi^2/9$ base pairs a turn, the digits of Face C of the Rydberg.

The rise and the ground state

The height the helix climbs from one base pair to the next is set by hydrogen. **Hydrogen's ground-state ionisation energy, 13.6061160890060 eV, divided by four, is 3.40152902225151** — and ten of those is 34.015, the pitch of the common B form. The energy it takes to free hydrogen's electron and the step the living address climbs per letter are one number.

PART FIVE — THREE MORE ROADS TO THE SAME NUMBER

A value reached by one road might be a lucky fit. This one is reached by four, from subjects that have nothing to do with one another.

The Moho

```
FORMULA A6     THE MOHO ROAD
    the Moho   6366.1977236758134  ( 20000/π )   x  the veil 57.2957795130823  ( 180/π )   x  2
        =   729,512.52222483195          ->   α  =  0.0072951252222483195   at its decade
```

The seam at the top of the Earth's mantle, read through the veil and doubled, is α. **The planet's own dimensions carry the coupling of light to matter.**

The light

> **FORMULA A7 THE LIGHT ROAD**
> 299,789,233.6830892680 m/s ($2^3 \cdot 3^5 \cdot 5^6 \cdot \pi^2$) x α = 2,187,000 m/s (3^7 km/s)
> x 3/5 = 1312.2 kJ/mol ($3^8/5$) -> 13.6048896 eV ($2^8 \cdot 3^{12}/10^7$)

The G1 spin-orbit speed — the observed speed of light — multiplied by α gives the electron's orbital speed, 3^7 kilometres a second, with no π at all. Carried down by three-fifths it is hydrogen's quantum on the chemist's scale, 1312.2, and on the atom's, 13.6048896 — the two faces that fix the Faraday in the companion paper.

Mercury

> **FORMULA A8 THE MERCURY ROAD**
> Mercury's G2 year 87.95241635619598216 days ($5^6/(2 \cdot 3^2 \cdot \pi^2)$)
> / α = 12,056.327160493827160 ($5^9/(2 \cdot 3^4)$) the π^2 cancels
> = 125 x 96.450617283950617 the Faraday, x 5^3

The innermost planet's year, divided by α, loses its π entirely and lands on a pure {2,3,5} node — which is one hundred and twenty-five times the chemist's bridge. **The same α that winds DNA sets the year of the closest planet to the Sun, and joins it to the Faraday.**

Why water is not among the roads

Earlier versions of this paper counted the bend of the water molecule as a fifth road. It is left out of this revision on purpose. Water holds a different bond angle in each of its phases — ice, liquid and vapour — and in the Universal Force of Time each phase lives in its own space-time dimension, with its own orbital times and its own spin-orbit speeds. Until the structure of the water molecule across those dimensions is set out in full, its angle is not used here as evidence for α. The four roads that remain need nothing from it.



Figure 4 — Four roads to one number. The DNA helix's three turns; the Moho through the veil; the speed of light stepping down to hydrogen; and Mercury's year joining the Faraday. Each lands on 137.0778389 (125π²/9) exactly.

PART SIX — WHAT α IS: THE REGISTER BRIDGE

Why should one number turn up in a planet, a molecule, a rock seam and an electron at once? Because in the Universal Force of Time it is not four coincidences. **It is one thing seen four times.**

Conventional physics calls α the coupling constant of electromagnetism — a measure of how strongly charges feel light. The framework says there is no separate electromagnetic force to couple to; there is only T, flowing across registers. **α is the gear ratio between two of those registers: the celestial, where the Sun and the planets live, and the atomic, where the electron lives.** When T steps down from the orbit of Mercury to the orbit of an electron, it does so through α, and that is why the same number measures the planet's year and the atom's coupling.

This is also why α has no units. A gear ratio is a pure number: it counts how many turns of one wheel make a turn of the next. Change your units of length or time and the gears still mesh the same way. **The deepest property of α, its dimensionlessness, is exactly what a register bridge must look like.** And it is why the DNA helix carries it: the helix is the shape the flow of T takes at the biological register, and the three forms of the helix are the three registers it passes through.

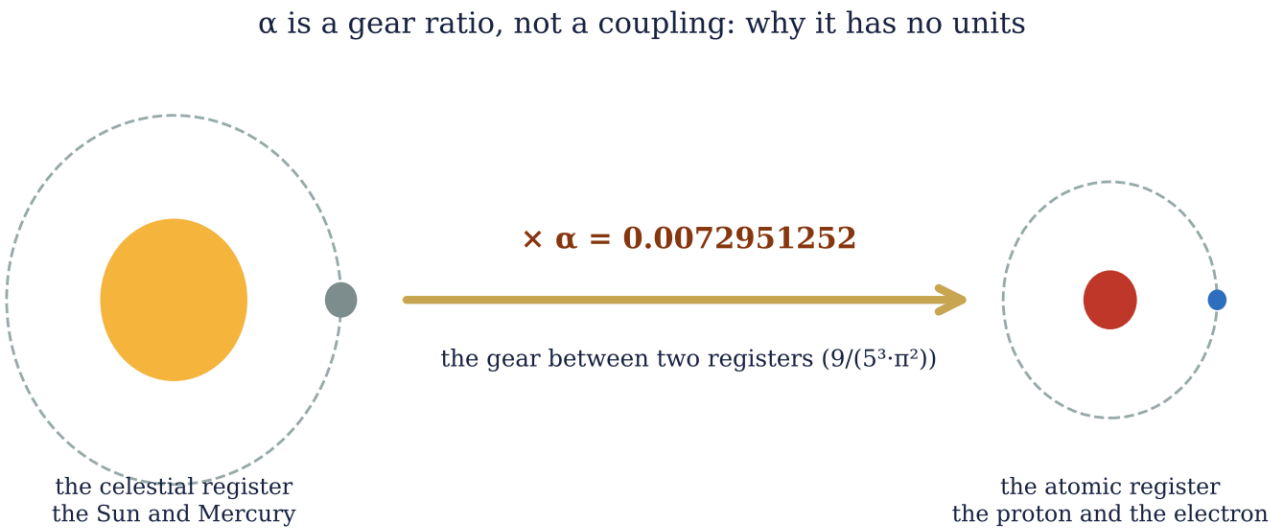


Figure 5 — The register bridge. T steps from the celestial register of the Sun and Mercury to the atomic register of the proton and electron through one gear, $\alpha = 9/(5^3 \cdot \pi^2)$. A gear ratio is a pure number, which is why α has no units.

Why the helix carries the bridge

The helix is not a molecule that happens to be wound to α. In this framework it is the shape the propagation of T itself takes at the biological register — the form time takes as it flows outward from the Sun. The flow creates matter at the nodes, the planets, and it creates life; and it does both in the same shape. That is why the inner solar system and the DNA helix keep turning up as one structure read at two scales.

The four bases of DNA are the four inner planets read at the register of the cell — adenine the Earth, thymine Mercury, guanine Venus, cytosine Mars — and the pairing rules follow the planets: adenine pairs with thymine as the Earth with Mercury, guanine with cytosine as Venus with Mars. The speed gears of the inner planets multiply to 125/12, which is the B form's turn. And α, the gear between the celestial register of the planets and the atomic register of the electron, is carried by the product of the helix's three forms. **The helix holds α because the helix is where the celestial and the atomic meet in a living thing**: its letters are the planets, its rise is hydrogen's ground state, and its turns, taken across all three of its registers, are the gear between them.

This is also why the reading form is the one that carries the π. To read a gene is to let the flow of T pass across the molecule and out again — an exchange across registers. The B form holds the address and the Z form returns it; neither of those is an exchange, and neither carries π. The A form is the crossing, and the crossing is where the coupling lives.

PART SEVEN — THE ELECTRON'S ANOMALY

A free electron is a tiny magnet, and the strength of that magnet is very nearly — but not exactly — a round number. The small excess is called the anomaly. The framework gives it a clean address:

> **FORMULA A10 THE ELECTRON'S ANOMALY**
> $a_e = 0.001161055239595182 \quad (3^2/(2\cdot 5^3\cdot \pi^3)) = \alpha / (2\pi)$

The anomaly is α divided by 2π — the register bridge taken once around a circle. Even the electron's extra magnetism is the same gear, read one turn further.

In the conventional picture the anomaly is the sum of an endless series of corrections, each one smaller than the last, computed from diagrams of particles appearing and vanishing around the electron. The first and largest term of that series has long been known to be α over 2π; the rest are treated as small additions. The framework reads the first term as the whole of the thing: the electron's excess magnetism is the gear between the registers carried once around the circle of the electron's own turning. What the series adds beyond it is, on this reading, the difference between faces — the same kind of small, named step that separates every G1 value from its G2 face — not a cloud of virtual particles. That reading is stated here and its arithmetic is exact; the face-by-face account of the higher terms belongs to the quantum mechanics paper.

PART EIGHT — WHAT THIS REVISION CORRECTS

- **No comparison in parts per million.** The first versions measured the framework's value against a figure from physics tables and against other people's guesses. The framework's value is the value; this revision does not benchmark it against an off-lattice figure.
- **No foreign primes.** The first versions described the helix with a pitch of 34 Å, written as 2 × 17, and a diameter of 20 Å. Seventeen is not on the lattice. The three forms are now given by their exact turns, and the reading form by its exact diameter, pitch and twist.
- **The three forms in full.** The first versions used one form of the helix and a factor of twelve. The three forms, B, A and Z, are now set out as three registers, and their product is shown to be ten over α.
- **New in this revision:** the reading form as Face C of the Rydberg; the pitch as Mercury's rotation seed; the three further roads; Mercury's year over α as one hundred and twenty-five times the Faraday; α as the register bridge; and the electron's anomaly as α over 2π.

CONCLUSION — ONE GEAR, READ IN MANY PLACES

The fine structure constant has been treated as the strength of a force, a number to be measured ever more finely and then wondered at. The Universal Force of Time takes the wonder seriously and answers it. **α is the gear between the celestial and atomic registers of time**, and it appears wherever T is read across that gap: in the turns of the DNA helix, in the seam beneath the crust, in the step from the speed of light to hydrogen's quantum, and in the year of the innermost planet. The helix carries it most completely, because the helix is the shape of the flow itself, and its three forms are the three registers the flow passes through — existence, reading and return.

It also explains why the value has resisted every attempt to derive it from science's own figures. Those figures are read on different faces — the charge on one dimension, the speed of light on another — and a coupling built from readings taken in different dimensions cannot land on a single clean number. Read dimension by dimension, it does: **137.077838904018870, five cubed times π squared over three squared, reached exactly by five roads with nothing fitted on any of them.**

WHAT STANDS, WHAT IS OPEN

Forced, and stated at full force. The three turns of the DNA helix multiply to exactly ten over α. B × Z is 125 and 1/α over A is 12.5. The A form's diameter, pitch, twist and turn are addresses, and the pitch over the diameter is 8/5. α is the register bridge between the celestial and atomic registers. Each is an exact relation in this paper.

Arrived at, and exact on every line. The Moho through the veil to α; the speed of light × α to 3^7 km/s, 1312.2 and 13.6048896; Mercury's year over α to $5^9/(2\cdot3^4)$, one hundred and twenty-five times the Faraday; the anomaly as α over 2π; the A turn as Face C; the A pitch as Mercury's rotation seed.

Open. The framework gives a diameter for each form but a rise only through hydrogen's ground state; the rise of the A and Z forms on their own registers is not yet routed. The sodium doublet — the visible splitting α produces in sodium's light — is described in the book, but the D1 line's lattice face is not yet fixed.

WHAT WOULD BREAK IT

- A form of DNA whose turn, closed around the circle, is not a lattice address — or a product of the three forms that departs from $1250\pi^2/9$.
- A road from an independent subject that lands on an α different from $9/(5^3\cdot\pi^2)$ by more than its own face spread, read on the framework's metre.
- A demonstration that the A form's pitch and Mercury's rotation seed are not the same address.

A NOTE ON THE NUMBERS

The values in this paper are written as plain numbers — not pinned to one unit, and not carried to one particular power of ten. Under the Universal Force of Time a quantity is not the property of one dimension: the same T-value shows up as a number of base pairs at one register, a radius in the Earth at another, a year at a third. The unit and the power of ten are the costume a number wears where it is read. That is why 1370.778 can be a product of helix turns and, at its decade, the inverse of α. Each number is given with its lattice address in brackets, so that the reader can rebuild it from 2, 3, 5 and π alone.

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APPENDIX — EVERY NUMBER, REBUILT

Each value below is rebuilt from its lattice form alone, at forty digits with π carried as a symbol.

THE VALUE			
1/α	$5^3 \cdot \pi^2 / 3^2$	137.0778389040188697064	
α	$3^2 / (5^3 \cdot \pi^2)$	0.007295125222248319543959	
THE THREE TURNS			
B	$5^3 / (2^2 \cdot 3)$	10.41666666666666666667	twist 34.56°
A	$2 \cdot 5 \cdot \pi^2 / 3^2$	10.96622711232150957648	twist $324/\pi^2$ = 32.82806350011743795°
Z	$2^2 \cdot 3$	12	twist 30°
B x A x Z	$2 \cdot 5^4 \cdot \pi^2 / 3^2$	1370.778389040188697064	= 10/α
B x Z	5^3	125	
(1/α) / A	$5^2 / 2$	12.5	
THE READING FORM			
diameter	$5^6 / (2^3 \cdot 3^3 \cdot \pi)$	23.02588875750800575360 Å	
pitch	$5^5 / (3^3 \cdot \pi)$	36.84142201201280920576 Å	
p / d	$2^3 / 5$	1.6	
twist, rad	$3^2 / (5 \cdot \pi)$	0.5729577951308232087680	
THE ROADS			
Moho x veil x 2		729512.5222248319543959	-> α
c_G1 x α	3^7 x 10^3	2,187,000	
x 3/5 / 10^3	$3^8 / 5$	1312.2	
Mercury / α	$5^9 / (2 \cdot 3^4)$	12056.32716049382716049	= 125 x 96.450617283950617
THE ANOMALY			
a_e	$3^2 / (2 \cdot 5^3 \cdot \pi^3)$	0.001161055239595181611	= α/2π
rise	IE(G2)/4	3.401529022251508625 Å	

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