

Atomic Number Fixed the Periodic Table



The Quantum Blueprint of the Elements

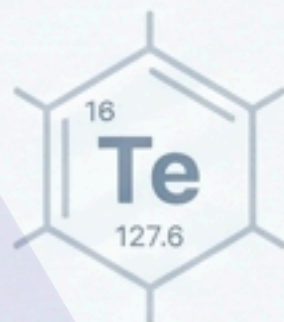


The Mendeleev Limitation: The Mass Anomaly

Tellurium (Te)

Atomic Weight: 127.6

Placed in: Group VI



Iodine (I)

Atomic Weight: 126.9

Placed in: Group VII



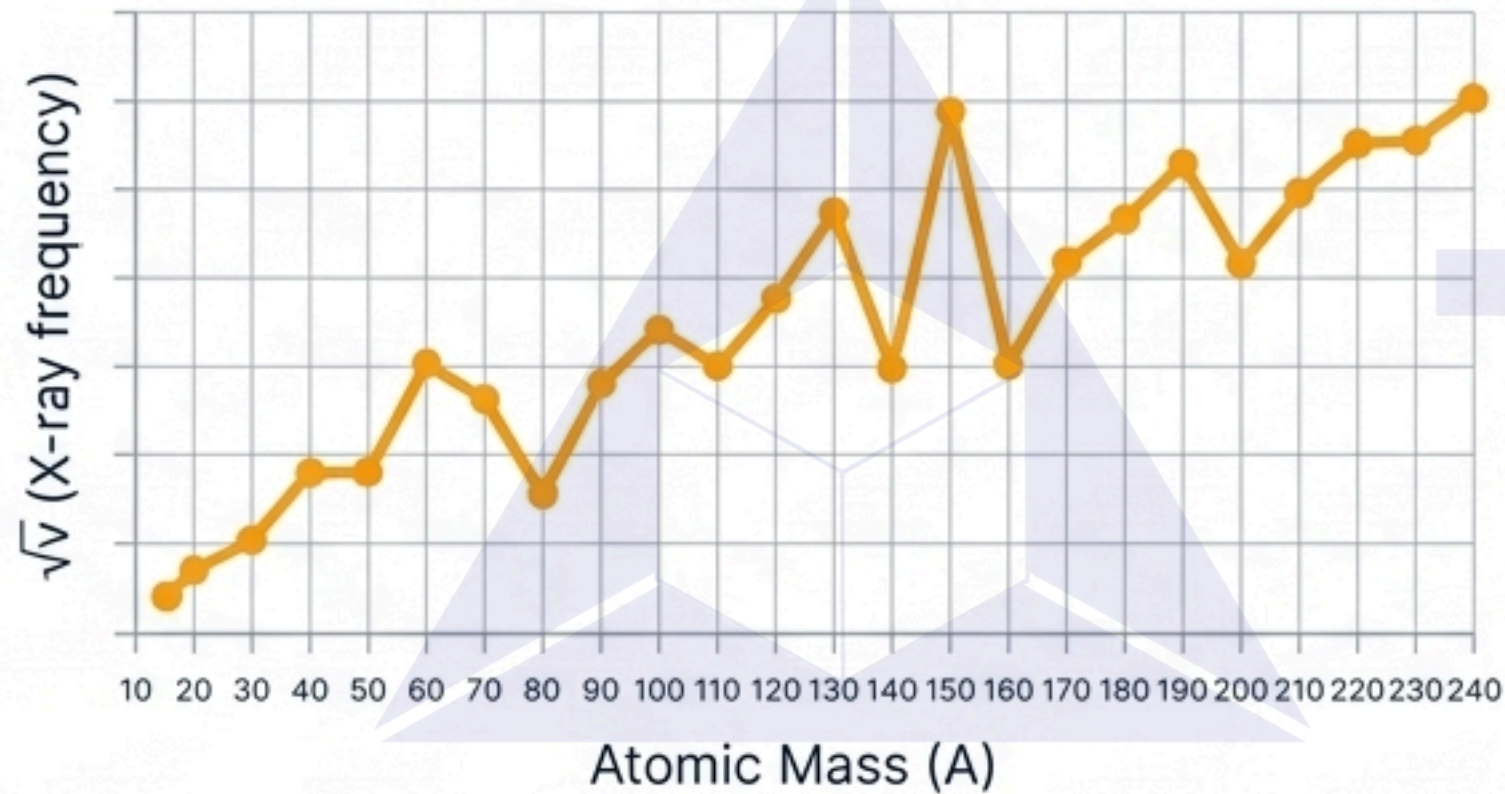
**Strictly following increasing
atomic mass puts Iodine BEFORE
Tellurium—breaking the
chemical property groups!**

Key Takeaway: Mendeleev had to ignore his own rule of atomic weights to make the chemical properties match.

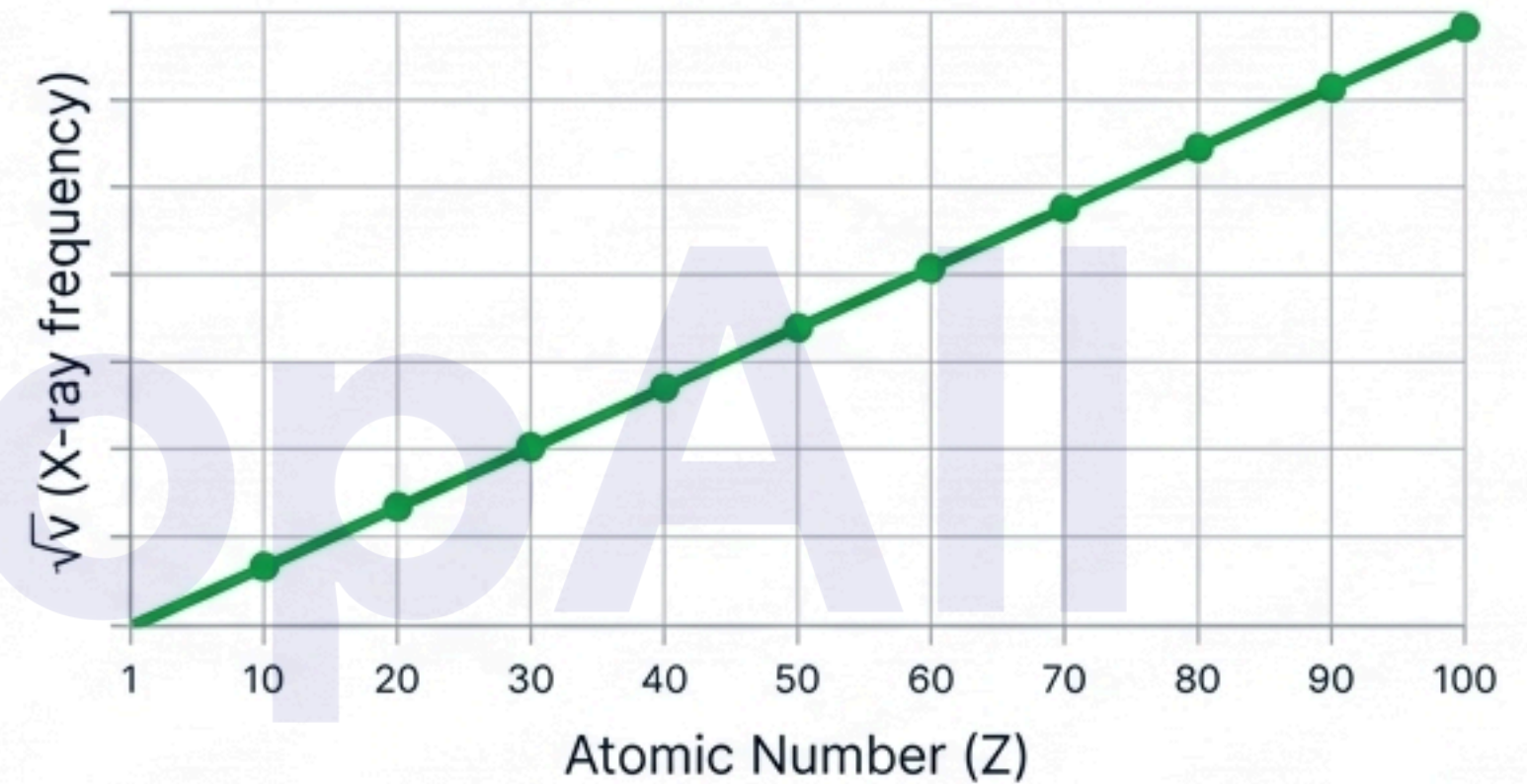
The Moseley Insight (1913): Z is Fundamental



Graph A: Flawed



Graph B: Perfect



A straight line proves Atomic Number (Z) is a more fundamental property of an element than its atomic mass.



You've Learned the Theory. Let's Test Them Now.

$$E=mc^2$$



Turn theory into marks with **unlimited MCQs, smart analysis, and focused revision.**

Practice Now



At prep.topall.app

Key Highlights

- » Free Study Material, Videos & Infographics
- » Push Your Limits with Level-Based Challenges
- » Climb the Leaderboard Among Fellow Aspirants
- » Practice Unlimited MCQs for NEET & JEE
- » Get Clear Explanations, Not Just Marks
- » Track Your Performance Smarter



The Modern Periodic Law

The physical and chemical properties of the elements are periodic functions of their

~~atomic weights~~

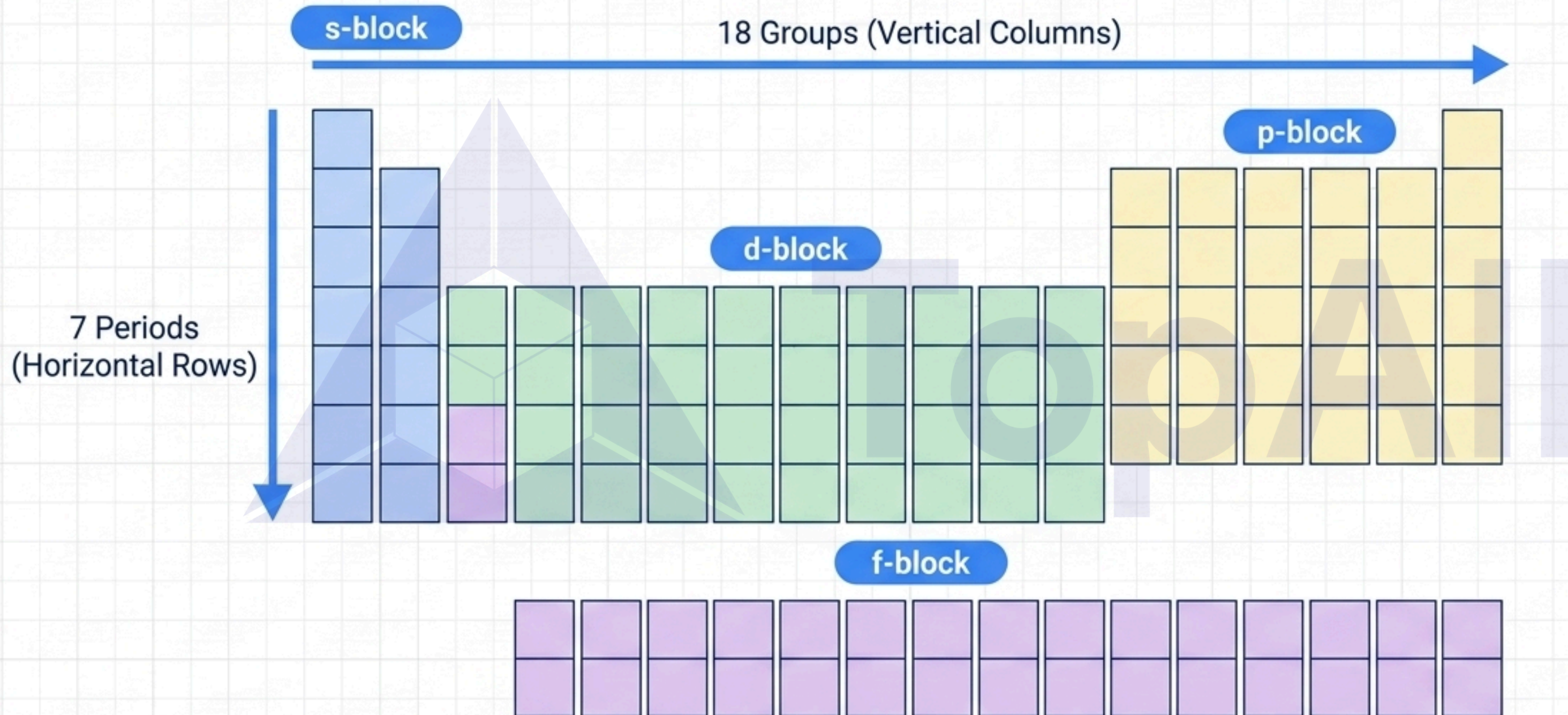
ATOMIC NUMBERS (Z)

Z = Nuclear Charge

Z = Number of Protons

Z = Electrons in a Neutral Atom

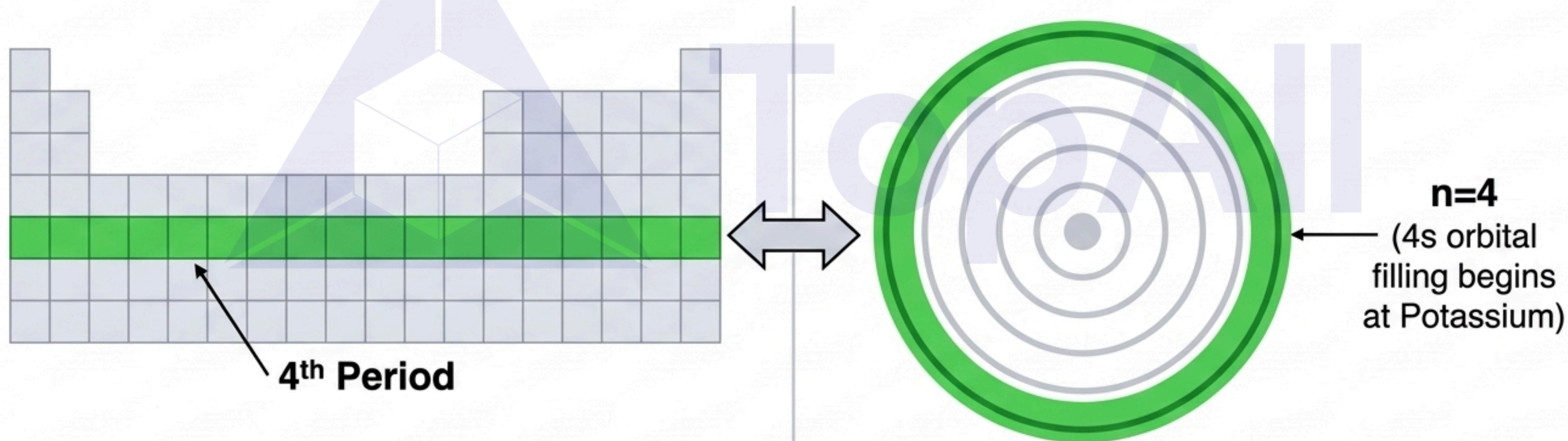
The Long-Form Architecture



Rule: Elements in the same group have similar outer electronic configurations.

Periods & Quantum Shells

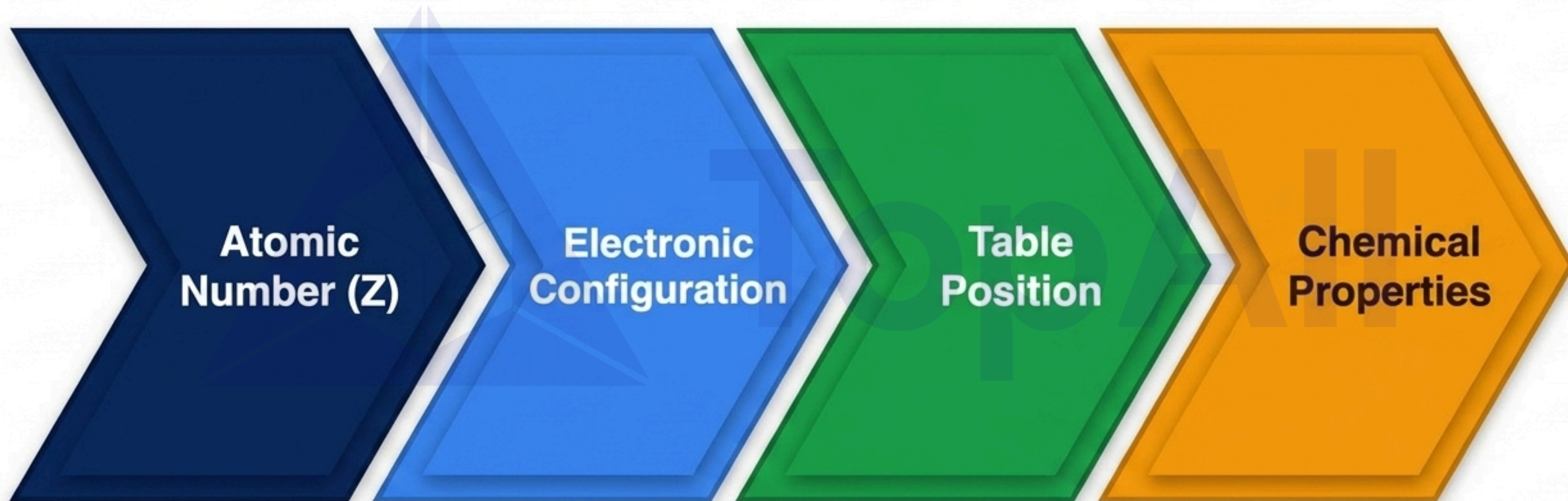
Period Number = Highest Principal Quantum Number (n)



The number of elements in each period is exactly twice the number of atomic orbitals available in that energy level.

The Quantum Causal Chain

RANK BOOSTER SUMMARY



Mastering this sequence allows you to predict the exact properties of an element simply by knowing its atomic number.



You've Learned the Theory.

Now Let's Test It.

Reading notes gets you knowledge.

Practicing MCQs gets you marks.

That's exactly what TopAll Pro is built for.

Try TopAll Pro Now

What TopAll Pro Does Differently

-  **Stuck? Snap it. Solve it. — Doubts AI**
Photo → step-by-step solution in seconds, 24/7
-  **Your AI Coach finds your blind spots**
Concept-level weakness detection — not just chapter-level
-  **4.5 Lakh+ questions. Never run out.**
13× more content than any other prep app in India
-  **Build your own test in 60 seconds**
Pick a chapter, set difficulty — AI does the rest instantly.
-  **AI Recommendation that helps you improve**
AI Recommendation Analysis your Tests and tell you where you need to improve.



Practice the moment you finish studying
Jump in while the concept is still fresh in your head

4.5L+
MCQs

1.5L+
Students

AI Powered
In-Depth Analysis