

Twitter Thread by RapperPandit ■■ ■■■■■■4■■■■■■■



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***BIGGEST EXPOSE Of LOST INDIAN HISTORY WITH SHOCKING EVIDENCES-presented by [@i4kashmir](#)**

Oh Bharata ! It was Hidden from you for AGES !!

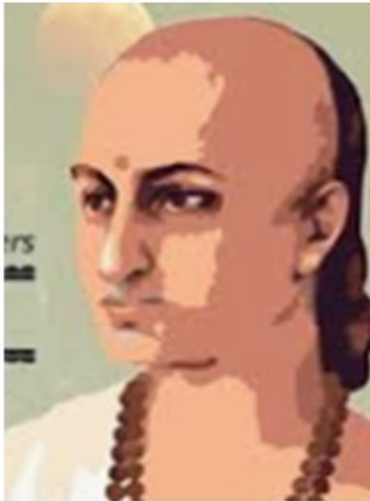
- How Did Europe from Dark Ages come to Renaissance?

-1188 Years ago, who was this Genius Rishi who Did Clossal Works Surpassing Issac Newton?

2/n: At a mere 23 years of Age, this Genuis Rishi created the most colossal ever treatise in Mathematics, 1188 Years before Issac Newton. He Name: Aryabhata (■■■■■■■)

lets read slowly many FASCINATING Findings (Even if you dont hav Math Background !). You will ENJOY the Magic!

1188 YEARS before Sir ISSAC NEWTON



**At the Age of mere 23 years
this genius Rishi Aryabhata
compiled Colossal work of**

ARYABHATIYA

**Bigger and Original than
Philosophiæ Naturalis Principia
Mathematica of ISSAC NEWTON**

SOME CONTRIBUTIONS

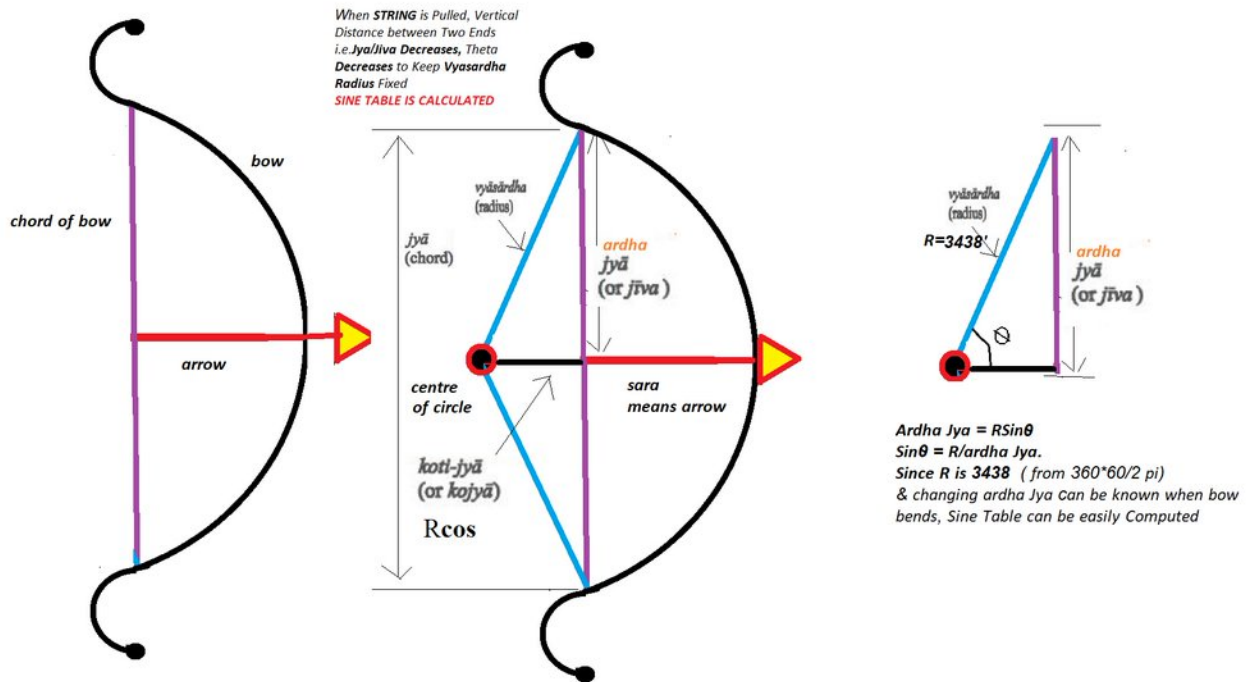
- PLACE VALUE USING ZERO**
- ALGEBRA**
- ARITHMETIC**
- TRIGNOMETRY & SINE TABLES**
- CALCULUS**
- POWER SERIES & -CONTINUOUS FRACTIONS**
- DAYS OF YEAR & EARTH IS ROUND**
- AREA OF TRIANGLE**
- QUADRATIC EQUATIONS**
- PLANETARY MOTION, PLANES & ECLIPSES**
- HELIOCENTRISM & REVOLUTION OF EARTH**
- CIRCUMFERENCE OF EARTH & ITS ROTATION**

A Shloka represents modern day Differential Equation
See the Illustration below. See the Brilliance !!

Presented by India4Kashmir Group @i4kashmir
Researched&Compiled by @rapperpandit



SINE TABLE COMPUTED FROM THE WORKING OF BOW BY ARYABHATA



Āryabhaṭa gives the following rule for deriving the successive sine-differences. It corresponds to the well-known differential formula

$$\frac{d^2 (\sin x)}{dx^2} = -\sin x$$

प्रथमाच्चापज्यार्धाद्वैरुनं खण्डितं द्वितीयार्धं ।

तत्प्रथमज्यार्धाद्वैरुनं तैस्तैरुनानि शेषाणि ॥*

The term 'Sine' is equivalent to the modern sine multiplied by the radius 3438. According to the rule, each sine-difference diminished by the quotients of all the previous differences and itself by the first difference (viz., 225),

4/n In Rishis (■■■■) of ancient India were accomplished Mathematicians and Scientists with a spiritual touch. The MASTERS !!

Another Equation represents Value of pi (Π), the Atma of Geometry.

VALUE OF PI (Π)

चतुरधिकं शतगष्टगुणं द्वाषष्टिस्तथा सहस्राणाम् ।
अयुतद्वयविष्कम्भस्यासन्नो वृत्तपरिणाहः ॥

Means a Circle with Diameter 20,000 will have Circumference 62,832

$$\Pi = \frac{62,832}{20,000} = 3.1416$$

diff Eqn & Sine Table

Āryabhaṭa gives the following rule for deriving the successive sine-differences. It corresponds to the well-known differential formula

$$\frac{d^2 (\sin x)}{dx^2} = -\sin x$$

प्रथमाच्चापज्यार्धाद्वैरुनं खण्डितं द्वितीयार्धं ।

तत्प्रथमज्यार्धाशैस्तैस्तैरुनानि शेषाणि ॥ *

The term 'Sine' is equivalent to the modern sine multiplied by the radius 3438. According to the rule, each sine-difference diminished by the quotients of all the previous differences and itself by the first difference (viz., 225),

5/n Buth What did Aryabhata do with It? Of what use?

He created Magic. The Values of-

-Earth's Diameter

-Value of pi (Π)

-Days in a year.

-Sin Table

All CORRECT!!

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CALCULATIONS	UOM	ARYABHATA आर्यभट	MODERN MATHEMATICS
EARTH-Circumference	Miles	24,835	24,901
Days in Year	Days	365.3586	365.25
Value of pi (π)	Ratio	3.1416	3.1415926...
Rsin(45degree) (R=3438)	Value	2431	2431.0331

Aryabhata used value of R=3438.

Jya (Jiva) refers ardha-Jya (Jiva) (ardha dropped)

Example :

so $jyā$ 45degrees = R sin (45degree) = 3438 x 0.7071 = 2431

See how closely values are matching with Modern mathematics

$$Ardha Jya = R \sin \theta$$

$$\sin \theta = R / ardha Jya.$$

Since R is 3438 (from $360 \times 60 / 2 \pi$)

& changing ardha Jya Can be known when bow bends, Sine Table can be easily Computed

Sl. No	Angle (A) (in degrees, arcminutes)	Value in Āryabhata's numerical notation (in Devanagari)	Value in Āryabhata's numerical notation (in ISO 15919 transliteration)	Value in Hindu-Arabic numerals	Āryabhata's value of jya (A)	Modern value of jya (A) (3438 × sin (A))
1	03° 45'	मखि	makhi	225	225'	224.8560
2	07° 30'	भखि	bhakhi	224	449'	448.7490
3	11° 15'	फखि	phakhi	222	671'	670.7205
4	15° 00'	धखि	dhakhi	219	890'	889.8199
5	18° 45'	णखि	nakhi	215	1105'	1105.1089
6	22° 30'	अखि	ñakhi	210	1315'	1315.6656
7	26° 15'	उखि	nakhi	205	1520'	1520.5885
8	30° 00'	हखि	hasjha	199	1719'	1719.0000
9	33° 45'	सखि	skaki	191	1910'	1910.0505
10	37° 30'	किण	kisga	183	2093'	2092.9218
11	41° 15'	मघकि	śghaki	174	2287'	2286.8309
12	45° 00'	किष्व	kighva	164	2431'	2431.0331
13	48° 45'	ग्लकि	ghlaki	154	2585'	2584.8253
14	52° 30'	किग्र	kigra	143	2728'	2727.5488
15	56° 15'	हक्य	hakya	131	2859'	2858.5925
16	60° 00'	धकि	dhaki	119	2978'	2977.3953
17	63° 45'	किच	kica	106	3084'	3083.4485
18	67° 30'	सा	sga	93	3177'	3176.2978
19	71° 15'	झा	jhaśa	79	3256'	3255.5458
20	75° 00'	ञ्व	nva	65	3321'	3320.8530
21	78° 45'	खल	kla	51	3372'	3371.9398
22	82° 30'	प्ल	pta	37	3409'	3408.5874
23	86° 15'	फ	pha	22	3431'	3430.6390
24	90° 00'	छ	cha	7	3438'	3438.0000

jyā 45degrees

sum of *jya*
 225+224+...164
 = **2431**

6/n Aryabhatiya Treatise comprised of

-Gitikapada - Cosmology-Cryptic Encryption of BigNumbers

-Ganitapada-Arithmetic,Mensuration,Equations,

-Kalakriyapada-Planetary Motion

-Golapada- Geomtetry/Trignometry/Planets/Shapes


e.g. What Cryptic Number ■■■■■■ Contains? TRY IT YOURSELF!

7/n

-He Formalized Place Value System (Tens, Hundreds, Thousands). Please see the Shloka in the Illustration.

-Worked with numbers upto 10^{62} (which means one hundred novemdecillion). CANT EXPLAIN HOW BIG IS IT. JUST SEE HERE

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एक च दश च शतं च सहस्रमयुतनियुते तथा प्रयुतम् ।
कोट्यर्बुदं च वृन्दं स्थानात् स्थानं दशगुणं स्यात् ॥ २ ॥

अनुवाद—एक, दश, शत, सहस्र, अयुत, नियुत, प्रयुत, कोटि, अर्बुद तथा
वृन्द में प्रत्येक पिछले स्थान वाले से अगले स्थान वाला दस गुना है ।

meaning - ones, tens, thousands, ten-thousands, hundred thousand, one million, ten million, hundred million, one billion, each is 10 more than the previous place holder.

ganitpaad, Aryabhata

	Indian notation	Power notation	Equivalent numeric representation	Short scale Western
एक (ēka)	1	10^0	1	One
दश (daśa)	10	10^1	10	Ten
शत (śata)	100	10^2	100	One hundred
सहस्र (sahasra)	1,000	10^3	1,000	One thousand
अयुत (ayuta)	10,000	10^4	10,000	Ten thousand
लक्ष (lakṣa)	1,00,000	10^5	100,000	One hundred thousand
नियुत (niyuta)	1,00,000 daśa	10^6	1,000,000	One million
कोटि (kōṭi)	1,00,000 śata	10^7	10,000,000	Ten million
शङ्कु (śaṅku)	1,00,000 koṭi	10^{12}	1,000,000,000,000	One trillion
महाशङ्कु (mahāśaṅku)	1,00,000 śaṅku	10^{17}	100,000,000,000,000,000	One hundred quadrillion
वृन्द (vṛnda)	1,00,000 mahāśaṅku	10^{22}	10,000,000,000,000,000,000,000	Ten sextillion (ten trillion)
महावृन्द (mahāvṛnda)	1,00,000 vṛnda	10^{27}	1,000,000,000,000,000,000,000,000,000	One octillion
पद्म (padma)	1,00,000 mahāvṛnda	10^{32}	100,000,000,000,000,000,000,000,000,000,000	One hundred nonillion
महापद्म (mahāpadma)	1,00,000 padma	10^{37}	10,000,000,000,000,000,000,000,000,000,000,000,000	Ten undecillion
खर्व (kharva)	1,00,000 mahāpadma	10^{42}	1,000,000,000,000,000,000,000,000,000,000,000,000,000	One tredecillion
महाखर्व (mahākharva)	1,00,000 kharva	10^{47}	100,000,000,000,000,000,000,000,000,000,000,000,000,000	One hundred quattuordecillion
समुद्र (samudra)	1,00,000 mahākharva	10^{52}	10,000,000,000,000,000,000,000,000,000,000,000,000,000,000	Ten sexdecillion
ओघ (ōgha)	1,00,000 samudra	10^{57}	1,000,000,000,000,000,000,000,000,000,000,000,000,000,000,000	One octodecillion
महौघ (mahaugha)	1,00,000 ogha	10^{62}	100,000,000,000,000,000,000,000,000,000,000,000,000,000,000,000	One hundred novemdecillion










8/n

- Aryabhata (■■■■■■■) was one of the Greatest. But DO WE KNOW OTHERS.

-Below Work is a compilation done of the CHRONOLOGY & DETAILS OF MAJOR MATHEMATICIANS, World Over from 800BC till 18th Century. The Details in the Illustration are not only AMAZE YOU but SHOCK as well !

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MATHEMATICIAN	PLACE	PERIOD	AREAS OF MATHEMATICAL WORKS	REMARKS
 VEDAS / VEDANGAS	BHARAT	OLDER THAN 10000BC	RIG VEDA YAJUR-VEDA (Satpatha Brahmana/Taittiriya Samhita) ATHARVA-VEDA VEDANGAS (Shiksha/Chandas/Kalpa/Jyotisha)	VEDAS are well preserved by <i>Shruti</i> and predate 10000 BC however mathematical Treatised based of them before 800 BC are Lost.
 BAUDHAYANA (INDIA)	BHARAT	800BC	PREDATED PYTHAGOREAN THEOREM, SULABH SUTRAS, SQUARE ROOTS, AREA OF TRIANGLE ,	TREATISE- Baudhāyana Sulbasūtra
 PINGALA (Attock, present PAKISTAN)	BHARAT	500BC	BINOMIAL NUMBERS AND WORKS PREDATED FIBNOCCI SERIES, PREDATES PASCALS TRIANGE	TREATISE-ChandraSastra
 PYTHAGORAS (Samos, GREECE)	GREEK	570-495BC	COPIED PYTHAGOREAN THEOREM AFTER VISIT TO INDIA TO LEARN MATHEMATICS	HE USED THE EXISTING INDIAN WORKS OF BAUDHAYAN & PINGALA
 EUCLID (Alexandria, EGYPT)	EGYPT	400-300BC	ELEMENTS BOOK ON GEOMETARY, PRIME NO, ARITHMETIC HEAVILY USED WORKS OF INDIAN MATHEMATICS	HE USED THE EXISTING INDIAN WORKS OF PINGALA/PANINI / BAUDHYANA
 VARAHAMIHIRA (Malwa, M.P.)	BHARAT	505-587AD	PLANETARY MOTION, ECLIPSES, SEASONS, ARCHITECTURE, TRIGONOMETRY, OPTICS, PERMUTATION/COMBINATION	TREATISE-Brihat-Samhita Pancha-Siddhantika
 ARYABHATA (Patna, BIHAR)	BHARAT	476-550AD	PLACE VALUE SYSTEM, ALGEBRA, HELIOCENTRISM, MENSURATION, ARITHMETIC, TRIGNOMETRY, SINE TABLES, CALCULUS, GEOMETRIC PROGRESSIONS, POWER SERIES, CONTINUOUS FRACTIONS, DAYS OF YEAR, AREA OF TRIANGLE, EARTH IS ROUND, QUADRATIC EQUATIONS, PLANETARY MOTION & PLANES, ECLIPSES	TREATISE- Aryabhatiya - Gitikapada - Ganitapada - Kalakriyapada - Golapada
 BRAHMAGUPTA (Jalore, RAJSTHAN)	BHARAT	598-668AD	MATHEMATICAL OPERATIONS WITH ZERO AND NEGATIVE NUMBERS, FRACTIONS, SUM OF FIRST N NATURAL NOS, GRAVITY, LINEAR EQUATIONS, LEMMA, PREDATES PELL'S EQUATION, TRIGNOMETRY, ALGEBRA,	TREATISE- Brāhmasphuṭasiddhānta Khaṇḍakhadyaka
 BHASKARA I (Parbhani, MAHARASHTRA)	BHARAT	600-680AD	POPULARIZED BRAHMI NUMERALS (MODERN DAY {0,1,2,9} SYMBOL FOR ZERO, PRIME NUMBER THEORY, DECIMAL SYSTEM, DEVELOPED WORKS OF ARYABHATTA ON TRIGNOMETRY, PI, AND EQUATIONS	TREATISE- Āryabhaṭīyabhāṣya Mahābhāskariya Laghubhāskariya

9/n But Let's Revisit the WORLD GEOGRAPHY -PERSIA, ROME, UK, EGYPT, GREEK, Before Going to Next Tweet in the THREAD.

Check the Illustration below-



10/n But MOST People think Everything Originated in EUROPE, Egypt and Greek .

-BUT WHY ?

-WHAT IS THE TRUTH ? WHERE IS THE EVIDENCE?

The below illustration is an extensive Research that will Open the SECRETS of this HIDDEN HISTORY . A BIG EXPOSE !!



SPREAD WHERE/ WHEN?	HISTORICAL EVIDENCES
SPREAD TO GREECE (4000-300 BC)	<p>-In Sankrit Yavana means Greek. During Mahabharata era around min 3200BC, (around 5200BC as per Nilesh Oak) Jarasandh allies with Kalvayana, the Yavan (Greek) King to Fight Lord Krishna at Mathura. So India-Greek Relation is Very Old, Many of Greek Gods and Legends are common with Sanatan Dharam (Hinduism) . RIG VEDA, YAJUR-VEDA(Satpatha Brahmana/Taittiriya Samhita) , ATHARVA-VEDA, VEDANGAS(Shiksha/Chandas/Kalpa/Jyotisha) as old as >10,000BC (by researchers) , contain core Mathematics</p> <p>-Also Greek Historians have been living in India to Learn and pass on Knowledge on indian Philosophy/Science/Mathematics/Society e.g. Megasthenese (350BC-290BC) lived for several decades in India and passed on his knowledge to GREECE; composed book INDICA</p>
SPREAD TO EGYPT (4000- 300 BC)	<p>-Pre Islamic/Pre Christian EGYPT dates back to 4000BC. At that time Many of Greek Gods and Legends are common with Sanatan Dharam (Hinduism).</p> <p>-Lothal was Ancient Harrapa Port towal in Gujrat had most ancient dockyard dated as old as 3700 BC as per ASI studies. Dwarka and Lothal would trade in mettalurgy, gemstones , spices, weapons as far as Egypt/Greece thru sea route. Along with this knowledge on Philosophy/Science/Mathematics was also transferred.</p> <p>- PYRAMIDS Built Around 2500 BC needed knowledge of Geometry, Astronomy, Arithmetic. RIG VEDA, YAJUR-VEDA(Satpatha Brahmana/Taittiriya Samhita) , ATHARVA-VEDA, VEDANGAS, (Shiksha/Chandas/Kalpa/Jyotisha) as old as >10,000BC, contain core mathematics.</p> <p>-Egypt is also naval neighbour/ trading partner to Greek through a close Sea Route. and knowledge transfer is imminent</p>
SPREAD TO MIDDLE-EAST (780-1050AD)	<p>-Parsis in india are persecuted Persians of present Day Iran. Iran had buddhism till 2nd Cent AD, then Zoarastrian till Islamic Invasion. Perisan imported Chess from India.</p> <p>-Persian Kings Anushirvan (501 - 579 AD), Ardeshir (180- 242 AD), Barmaks (705 782 AD) sent various courtiers and residents to India to Learn from Science, Mathematics to Medicine</p> <p>-Persian Scholars like Al-Biruni Spent 11 Years in India Learning Sanskrit and Indian, Science Literature & Mathematics.</p>
SPREAD TO EUROPE (1500-1800AD)	<p>-ROBERT OF CHESTER / ROBERT OF KETTON/GHERAD OF CREMONA and many other English Arab Men during 12th Century (1140-1150) translated many Middle East Arabic Works to LATIN (Dominant European Language). Including Indian Mathematics, Mettalurgy, Sciences Learnt by Middle East from India. Within some decades Englishmen understood the the source of all Knowledge and Wealth/Trade was India.</p> <p>-India had Finest Navigation, Using Trignoemtry, and Sine Tables were Key to Travel World by Sea.</p> <p>- English men had great NEED to TRavel for Missionary Activities & Trade also.</p> <p>-Vasco De Gama, helped by Indian, came to india at Kozhikode, Kerala on missionary quest in 1498 .</p> <p>-JESUITS- Society of Jesus were formed in 1540</p> <p>-Between 1500 - 1600 many Jesuit missionaries flocked Kerala.</p> <p>-Even simple Multiplications in ROMAN NUMERALS would required days to calculate. How come suddenly Europeans became a Doyen in Mathematics? --> that led to Science and the Technology --> resulting in Industrial revolution- 1760 – 1840</p> <p>-Some of the knowledge they borrowed from the Greeks /Egyptians (who already had learnt it from India), However, most of the cases (from Mathematics, to Navigation, to Calender System) they used Existing Indian works of BRAHMGUPTA, ARYABHATA, BHASKARA2, VIRASENA, MADHAVA, NILKANTHA as it was IMPOSSIBLE in existing systems like ROMAN NUMBER SYSTEM & available EUROPEAN Knowledge Levels.</p>

(1140-50) translated many Middle East Arabic Works to LATIN (Dominant European Language). Including Indian Mathematics, Metallurgy, Sciences Learnt by Middle East from India.

12/n Let's Now now see the Journey of very familiar "sin & cos" from INDIA to EUROPE

■■■■■ /■■■■■ to "sin"

■■■■■■■■■■ /■■■■■■■■ to "cos"

<p>Presented by India4Kashmir Group @i4kashmir Researched&Compiled by @rapperpandit</p> 		
JOURNEY OF sin & cos OF TRIGNOMETRY		
<p>In Aryabhatiya the original representation of Sine was ardha-Jya (Jiva) (अर्ध ज्या / जिवा) half of the length between ends of Bow, which was Equal to Bow Chord in Resting position (sin 90deg)</p> <p>1</p>	<p>Due to frequent usage, ardha was dropped only jya or jiva used in maths.</p> <p>Cosine was represented by Koti-jya (Ko-Jya) (कोटिज्या / को ज्या) as Koti meant as side of right triangle,</p> <p>2</p>	<p>Persian Kings Anushirvan (501 - 579 AD), Ardeshir (180- 242 AD), Barmaks (705 782 AD) sent various courtiers and residents to India to Learn from Science, Mathematics to Medicine</p> <p>3</p>
<p>AL-KHWARIZMI from Khwarazm, PERSIA, (present day IRAN) WROTE <i>al-Kitāb al-mukhtaṣar fī ḥisāb al-jabr wal-muqābala</i> & mentioned SINE TABLES from Aryabhatiya</p> <p>4</p>	<p>Jiva (जिवा) picked (as Jiba (जिबा)), but when written in arabic generally short vowels are ommitted making it look like jb</p> <p>5</p>	<p>ROBERT OF CHESTER like many other English Arab Men during 12th Century (1140-1150) translated many Middle East Arabic Works to LATIN and book of Khwarizmi.</p> <p>6</p>
<p>Robert read the Araibic word jb (जब) as Jaib (जैब) meaning <i>curvature/breast</i> denoted sinus in Latin</p> <p>7</p>	<p>Sinus was used as Sine or sin in Math operations. So Jya/Jiva became Sine. & KoJya became Cosine or cos for Mathematical operations</p> <p>8</p>	<p>ज्या / जिवा became Sin कोटिज्या / कोज्या became Cos</p> <p>9</p>

13/n- But it is said many times there can be "OWNERS BIAS". So an Indian will praise an Indian always. But Wait. See the Website of Saudi Aramco owned by Govt of SAUDI ARABIA. Check the Article- CAN THERE BE BIGGER PROOF THAN THIS ? They HAVE ALWAYS GAVE CREDIT TO US

people of the early Indus Valley used tablets (made of clay or stone) covered with a layer of sawdust or sand to write numbers and perform mathematical calculations. The Arab world adopted this computational practice, calling it *hisab al-gubar* (dust-board arithmetic). Since the practice does not leave a permanent record, we are left only with scant information about these tablets. One of the earliest documents describing this medium of calculation is an 11th-century work by scholar and judge Said al-Andalusi of Córdoba titled *Tabaqat al-`Umam* (*Book of the Categories of Nations*). Seen as the first world history of science, al-Andalusi's compendium credits the Indus Valley for "great strides in the study of numbers."

MISLABELED FOR SEVERAL CENTURIES IN THE WEST AS "ARABIC NUMERALS," THE DECIMAL SYSTEM WAS CONCEIVED IN INDIA AND TRANSMITTED TO THE MIDDLE EAST EVEN BEFORE THE RISE OF ISLAM.

No less significant to modern mathematics are the works of Muhammad ibn Musa al-Khwarizmi. Born in the late eighth century. In the Khwarazam oasis, in what is now Khiva, Uzbekistan, Al-Khwarizmi moved to Baghdad during the reign of Al-Mamun. There, he served as a teacher and scholar in the famous *Bayt al-Hikma* (House of Wisdom), where the arts of translation and scholarship reached their zenith. His writings freely reference mathematical computations borrowed from Indus Valley. In his *Kitab al-Jabr wa al-Muqabala* (*The Book of Manipulation and Restoration*), he lays out its purpose:

[To teach] What is easiest and most useful in arithmetic, such as men constantly require in cases of inheritance, legacies, partition, lawsuits, and trade, and in all their dealings with one another, or where the

14/n- Please pause for a While, Think what all we and our youngsters have missed from BAUDHAYANA , PINGALA, VARAHMIRA, ARYABHATA, BHRAMAGUPTA, BHASKARA, VIRASENA, HEMACHANDRA, MADHAVA, NILAKANTHA.

■■ ■■■■ ■■■■■■ ■■ ■■■■ ■■■■ ■■ ■■ ■■■■■■ ■■■■■■ Always Remember the illustration:

—	=	≡	+	h	φ	?	5	?	BRAHMI
1	2	3	4	5	6	7	8	9	TODAY

JOURNEY FROM BRAHMI NUMERALS TILL TODAY

@rapperpandit credits - Journal of Institue of Engg , 2018, 14 (1): 136- 142
 Evidences of Heirarchy of Brahmi Numeral System - by Eka Ratna Acharya

