Intellectual Property Rights Activity- TRIZ

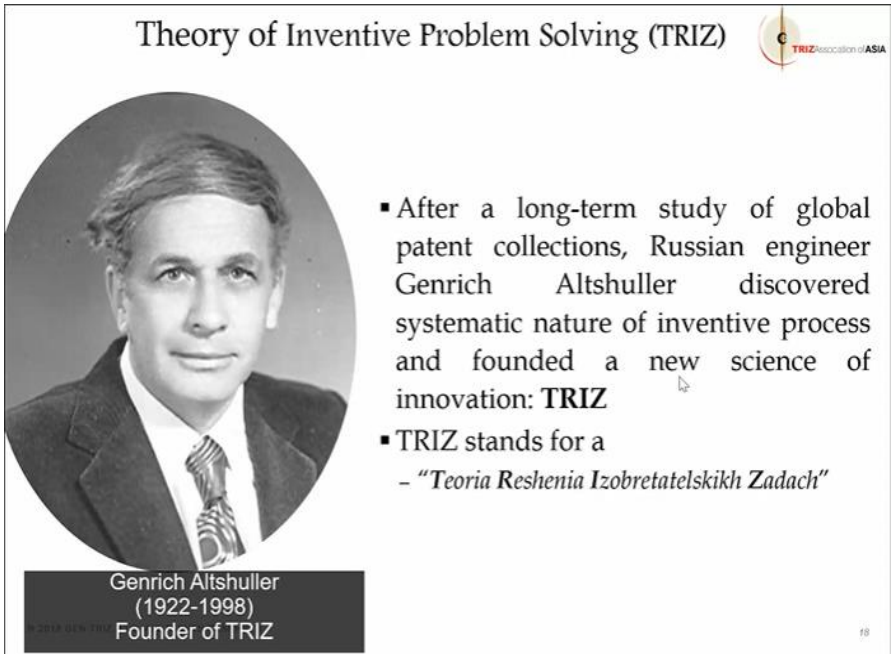
IPR cell of TCE organized a IP awareness programme on "**Triz Introductory Session by Triz Asia 8th April 2022**" to all our faculty members, research scholars and students of TCE. TRIZ (Theory of Inventive Problem Solving) , is a Scientific Method that develops strong thinking minds to develop innovation in our work. TRIZ also includes systematic methods for forecasting the future development of technologies, uncovering causes for disasters, and eliminating potential disasters. The expert covered the 40 principles behind TRIZ to create innovative solutions. 60 participants have attended and benefited from this programme.

Chief Guest Profile:

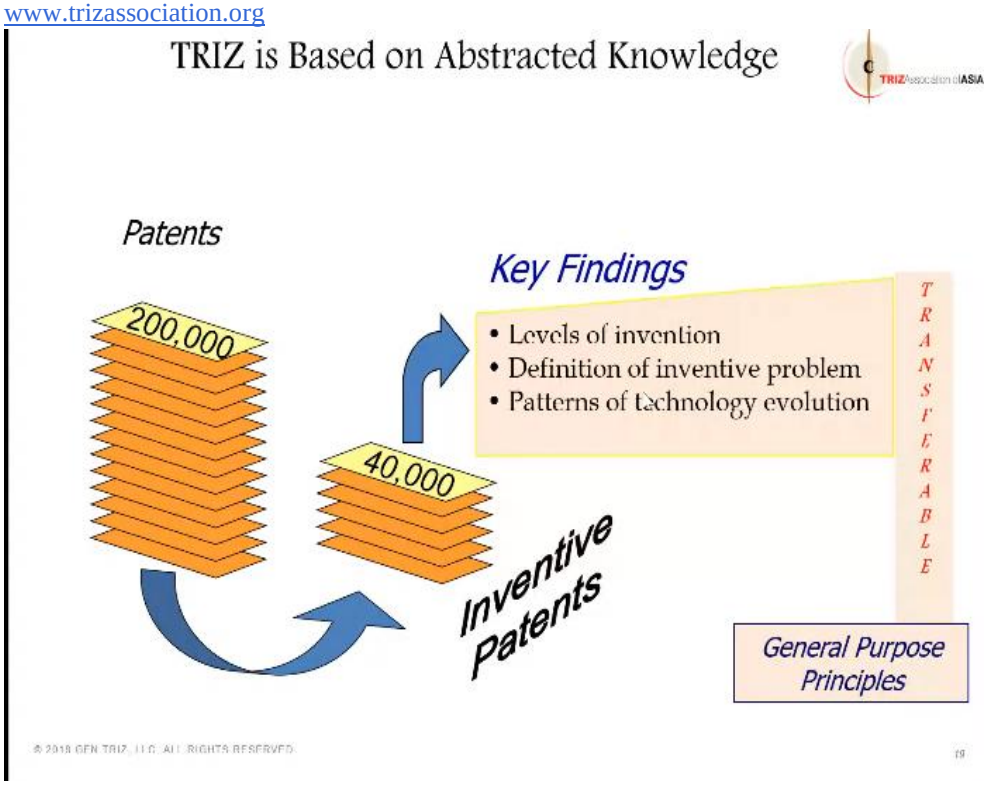
R. Sandeep H. Wankhade is the Associate Prof and Head, Department of Production Engineering at AISSMS College of Engineering, Pune, Maharashtra. He is nurtured with a rich blend in four major areas of Academics, Administration, Research and Innovation. He has completed BE, ME and Ph.D. and is currently pursuing his Post-doctorate research in 'Efficacy of TRIZ tools on the creativity of an individual'. He has rich work experience working in the industrial domain for 2 years and has been active in academics for 22 years and 1-year full-time international research being, involved in Training and active Consultancies. He has organized 30+ training programs in the last 3 years by National and International eminent speakers at State and university levels for Industry professionals and academicians through grants. He has delivered 90 odd sessions on Innovations through TRIZ, Industry 4.0, Sustainability,

Entrepreneurship, Project Selection, Creative Imagination Development, Critical Thinking, Creative Pedagogy, etc.

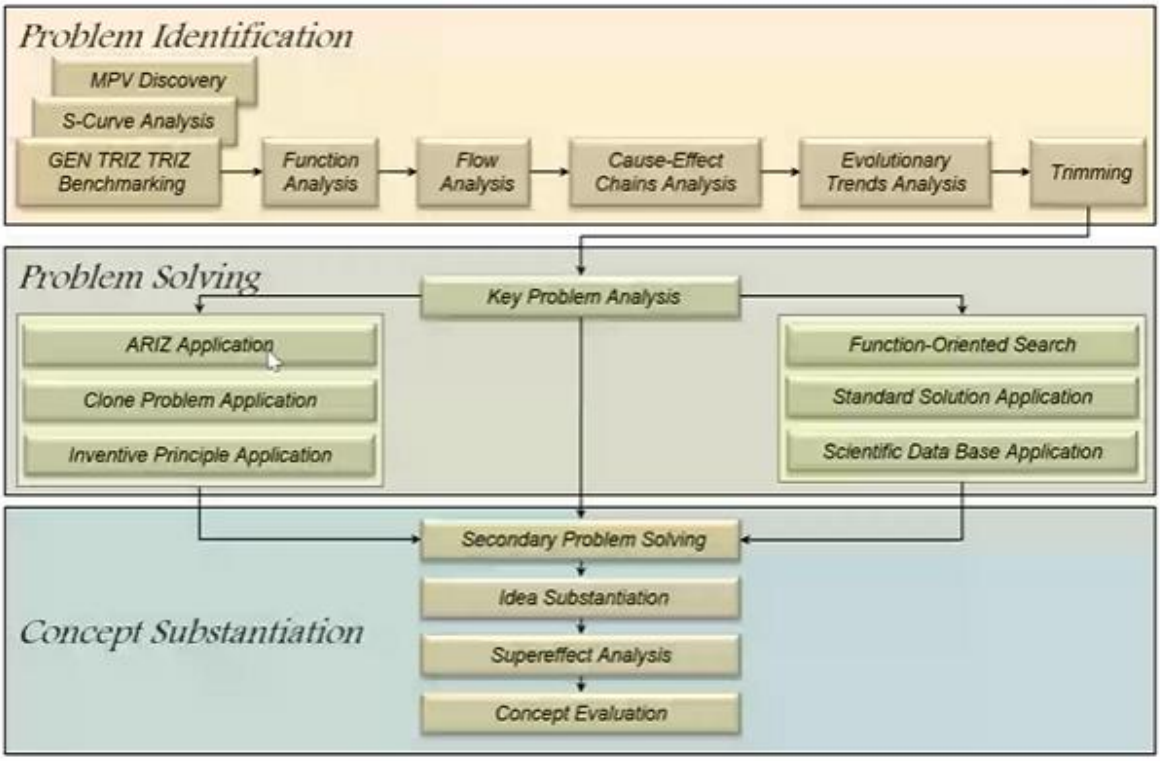
Some of the Glimpses of the Presentation



www.trizassociation.org



GEN TRIZ Innovation Roadmap



Altshuller's / Engineering Parameters

1. Weight of moving object
2. Weight of nonmoving object
3. Length of moving object
4. Length of nonmoving object
5. Area of moving object
6. Area of nonmoving object
7. Volume of moving object
8. Volume of nonmoving object
9. Speed
10. Force
11. Tension, pressure
12. Shape
13. Stability of object
14. Strength
15. Durability of moving object
16. Durability of nonmoving object
17. Temperature
18. Brightness
19. .Energy spent by moving object
20. Energy spent by nonmoving object
21. Power
22. Waste of energy
23. Waste of substance
24. Loss of information
25. Waste of time
26. Amount of substance
27. Reliability
28. Accuracy of measurement
29. Accuracy of manufacturing
30. Harmful factors acting on object
31. Harmful side effects
32. Manufacturability
33. Convenience of use
34. Repairability
35. Adaptability
36. Complexity of device
37. Complexity of control
38. Level of automation
39. Productivity

Triz Introductory Session by Triz Asia 8th April 2022

40 Inventive Principles

1. Segmentation
2. Extraction
3. Local quality
4. Asymmetry
5. Combining
6. Universality
7. Nesting
8. Counterweight
9. Prior counter-action
10. Prior action
11. Cushion in advance
12. Equipotentiality
13. Inversion
14. Spheroidality
15. Dynamicity
16. Partial or overdone action
17. Move to new dimension
18. Mechanical vibration
19. Periodic action
20. Rushing through
21. Convert harm to benefit
22. Blessing in Disguise
23. Self-Service
24. Feedback
25. Mediator
26. Copying
27. Substitute throwaway
28. Replace mechanical system
29. Use pneumatic-hydraulic system
30. Flexible shells and thin films
31. Porous materials
32. Color changes
33. Homogeneity
34. Discarding and recover
35. Parameter changes
36. Phase transitions
37. Thermal expansion
38. Strong oxidants
39. Inert atmosphere
40. Composite materials

Timestamp	Name	Department	Please Defin	E-mail	Have you un	Are you plar	How would
2022/04/08	M.ARUNA	Civil Engine	Faculty	maciv@tce.e	yes	Yes	Excellent
2022/04/08	Jothika R	Information	Student	jothikatamk	yes	Maybe	Good
2022/04/08	Prakash T	Mechanical	Faculty	tpmech@tce	yes	Yes	Excellent
2022/04/08	Vaghela Hir	ECE	Research Sc	vaghela@stu	yes	Yes	Excellent
2022/04/08	K Rajeswari	ECE	Faculty	rajeswari@t	yes	Yes	Excellent
2022/04/08	S.Suvetha	ECE	Student	ssuvetha@s	yes	Maybe	Good
2022/04/08	Saravana Pe	Mechanical	Faculty	sspmech@tc	yes	Maybe	Excellent
2022/04/08	Dr.V,Saravar	EEE	Faculty	vseee@tce.e	yes	Yes	Good
2022/04/08	Roshini	ECE	Student	broshini@st	yes	Maybe	Good
2022/04/08	P.SELVAPRA	CIIVL ENGIN	Faculty	pspciv@tce.	yes	Yes	Good
2022/04/08	SRIRAM VIG	ECE	Student	sriramvigne	yes	Yes	Excellent
2022/04/08	Devadharshi	ECE	Student	sdevadharsh	yes	Yes	Good
2022/04/08	BASKAR S	EEE	Faculty	deanrad@tc	yes	Yes	Good
2022/04/08	Parthasarath	Mechatronic	Faculty	parthasarath	yes	Maybe	Good
2022/04/08	sathya Bama	ECE	Faculty	sbece@tce.e	yes	Yes	Excellent
2022/04/08	Saktheeswar	ECE	Student	saktheeswar	yes	Yes	Good
2022/04/08	V. Vinoth th	ECE	Faculty	vvkece@tce	yes	Yes	Excellent
2022/04/08	POO ANNAM	ECE	Student	pooannama	yes	Yes	Good
2022/04/08	J.Nishanthy	Electrical an	Research Sc	nishanthyj@	yes	Yes	Excellent
2022/04/08	E. Murugava	ECE	Faculty	murugavalli	yes	Yes	Good
2022/04/08	Sharon Rubi	Mathematic	Faculty	sharonapma	yes	Maybe	Good

Any other Suggestions to improve the program in future

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Nil

similar session is required to improve our skills

It should be organized with other TRIZ theory.

Excellent session. We can also arrange offline session.

Good

A Case study on a specific application with complete TRIZ approach shall be presented.

40 Strategies with example to be explained for easy understanding

If its a live webinar its much more useful!!!

Nil

Make this a part of curriculum in lateral thinking and engineering exploration

The program could rather be a physical one than a webinar. It may help the participants connect wel

workshop with detailed case-studies will be useful

Nil

How to apply TRIZ for different engineering applications and mapping with corresponding patents

NIL

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May include some more online activity like poll,quiz etc. Physical interaction would be more efficient

Nice session...

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Nice session

l with the theme of the seminar.

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