

Commentary

Strategic Career Planning for the Uninterrupted Growth of an Engineering Faculty Member Through “RAAT”

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1. Independent researcher

Engineering faculty members of various institutions don't get counselors, coaches, or mentors. Many institutes face problems in recruiting outstanding faculty members and operating with limited resources. Many of them don't have neither strategic planning nor effective linkages with their employers. Under these circumstances, outstanding faculty members have to develop strategic career planning for uninterrupted growth under vulnerability, uncertainty, complexity, and ambiguity (VUCA). After identifying the discrimination lashed out at outstanding faculty members, the faculty members have to develop a “Research-Acquire-Adept- and Transform” (RAAT) model for strategic career planning. They have to conduct a SWOT Analysis and interpret the shortcomings. Further, they have to resolve the effects of VUCA. They have to develop professional goals and look beyond doctoral degrees. They have to plan self-directed faculty development programs to reach outstanding leadership positions. They may have to reframe career goals, and vision for accelerated growth based on a revised vision and coupled with lifelong learning methods. They have to plan interdisciplinary programs, and effective services to various companies. They have to get recognition for their outstanding performances from appropriate national academics and international societies. They have to plan diverse global faculty development programs. This model RAAT Model has enabled many outstanding faculty members to reach planned career goals. However, if the institutes are governed by toxic leaders, it will be very difficult to reach planned high positions. This could be a temporary bottleneck since the Ministry of Education would plan to introduce various development programs to get excellent outcomes. The well-performing faculty with all accomplishments will attain the best status in their career.

1. Introduction

Engineering faculty members of this 21st century have to meet many challenges in professional growth and they have to develop their skills and competencies to survive. To grow to higher positions, they have to systematically and strategically plan and achieve. There is no shortcut in the development process. One has to plan to continuously acquire global winning abilities through ethics, integrity, and lifelong learning. There are many obstacles and bottlenecks in planned growth^[1]. The faculty members have to assess the ever-growing challenges through strategic planning. They have to improve their abilities through lifelong learning, undergoing many advanced faculty development programs, massive online open courses (MOOCs), in-house development programs, summer and winter school programs, workshops, conferences, and self-directed learning. They have to join professional associations and attend meetings to learn advances in that field. There is no gain without pain. This research is centered on suggesting the best possible faculty development process where excellence will be honored in selecting outstanding faculty will reach higher positions in higher education. If the appropriate selection process is adopted, this will create needed human and knowledge capital. This will ultimately improve the economy and eradicate poverty. The turnover will be minimized. Needed graduates with desirable attributes will be ready to take up jobs in challenging industrial development.

2. Literature Survey

Tucker^[2] suggested self-directed faculty development in open-access colleges to improve instruction. She suggested creating individual, group, culture, and system changes. Cjangle^[3] explored the power of lifelong learning in engineering education. Daniele Viera^[4] suggested that lifelong learning is needed to achieve sustainable development goals. Soma Chakrabarti et al.^[5] concluded that lifelong learning in engineering is imperative to achieve sustainable development goals. Jeff Oheir^[6] found that professional engineers and students are embracing a mindset of self-directed and lifelong learning. Van Ameide, et al.^[7] suggested that to improve leadership in higher education institutions. Alana Jeni and Reddy^[8] recommended enhancing neurocognitive skills for further leadership and decision-making in higher education institutes. Somers^[9] concluded that distributed leadership is the future of management. MIT Professional Education^[10] offers courses for improving leadership skills for engineering and science faculty.

JNora Osakwe^[11] recommended faculty development through international courses. Stacey Friedman, et al.^[12] suggested offering international faculty development through partnerships. The University of Dayton supported internationalization for faculty development. Robert Ployhart et al.^[13] suggested acquiring and developing human capital in service contexts. Team foundit^[14] recommended utilizing sabbatical leave for faculty development. Stephanie Hinshaw^[15] concluded that learning about toxic leaders could help leadership practice. Elizabeth Perry^[16] suggested unleashing the faculty potential by breaking the glass ceiling. ETBU^[4] suggested developing a faculty portfolio carefully to reach higher cadres in teaching and research. Vedhathiri^[17] focused on developing diverse global educational leaders through learning organization concepts.

3. Statement of The Problem

“The outstanding engineering faculty members face many vulnerabilities, uncertainties, complexities, and ambiguities due to dominant toxic leaders who can’t tolerate their growth and accomplishments and continuously destroy their growth. Under these circumstances, the said faculty has to plan self-protection from the toxic leaders and their coteries. Otherwise, these faculty members’ growth can’t be accelerated. Hence, they need to be guided not only to protect themselves but also to plan safe growth”.

3.1. Objectives

The following are the objectives of this research;

- Identify the discrimination the toxic leader lashed out at the outstanding faculty members.
- Develop a “Research-Acquire-Adopt-Transform (RAAT)” model for faculty development
- Plan a safe growth path under vulnerabilities, uncertainties, complexities, and ambiguities (VUCA).
- Create dynamism in academic achievement to accomplish the vision.
- Suggest a safe ethics-based faculty development process through integrity

3.2. Research Methodology

The research methodology consists of an action research process. One has to identify the safe growth in planned professional goals. One has to master constitutional protection, and the dynamism needed in time management. This approach is due to various court judgments in similar circumstances. Most toxic leaders will conceal the communications, decisions taken by the governing councils, and service

and recruitment rules and isolate them. The poisonous leaders and the victims will stop this outstanding faculty members' growth and may not get counseling or mentoring from the chairpersons.

The research consists of a SWOT analysis, areas of professional leadership, and identification of threats due to vulnerability, uncertainty, complexity, and ambiguity (VUCA). Acquire centers around effective planning to acquire needed development that is available to the engineering faculty members. Adopt refers to accomplishing development based on the developments. Transform refers to creating an impact on the institute, developing many needed interdisciplinary and outcome-oriented educational programs, conducting interdisciplinary and multidisciplinary research programs, and publishing the results that transform the analyzing, designing, developing prototypes, testing, and improving them, choosing high-quality production process which will consume less power per unit and ensures a safe environment. Also, the qualified faculty teams could prepare bid documents for complex external projects under an International Development Agency. The well-accomplished team could create more intellectual properties and generate revenue from their users. Ultimately transformation will bring faster economic development to the region. The qualified faculty team should protect their legitimate growth from the toxic leaders of the institute.

3.3. SWOT Analysis

SWOT analysis is essential to investigate strengths, weaknesses, opportunities, and threats in higher education institutes. By SWOT analysis, a faculty can prepare a flawless development strategy.

Strengths of the Faculty Members	Weaknesses of the Faculty Members
<p>Possess desired entry-level qualifications.</p> <p>Motivated to grow further</p> <p>Ready to undergo postgraduate programs</p> <p>Looking for sponsored doctoral programs</p> <p>Some have completed short-term courses</p> <p>Some have completed MOOCs</p>	<p>Yet to create a strategic plan</p> <p>Yet to develop long-term career plans</p> <p>A few depend on assistantships</p> <p>Many institutes are not willing to nominate them for long-term faculty development programs.</p> <p>May not continue in the teaching profession</p>
Opportunities Available	Threats Predicted
<p>Quality improvement programs are available.</p> <p>Many new opportunities to join Technical Universities and the National Institutes of Technology</p> <p>Plenty of jobs are available in MSMEs</p> <p>Best candidates can get entry into overseas universities</p>	<p>Poorly performing colleges could be closed.</p> <p>Competition is growing for getting tenured jobs</p> <p>Desired postgraduate branches are very difficult to get</p> <p>Fellowships are limited</p> <p>Tuition fees are increasing</p> <p>Have to pay the interest on bank loans availed</p>

Table 1. SWOT Analysis

Interpretation: The strengths of the faculty members indicate that they need more assistance to complete postgraduate and doctoral programs. Many have yet to develop long-term career plans. Many opportunities are available in many State's Technical and National Institutes of Technologies. Threats are due to lack of funds. Hence, the young faculty members have to plan their careers.

3.4. Three Areas to Plan Professional Leadership and the Current Status

Faculty members should have balanced long-term plans to excel in research, education, and service. Only then can they grow in their careers. The needs are presented in Table 1.

Issue	Research	Education	Service
Desired skills	Should possess outstanding research skills.	Needs more training in planning and delivering lectures.	Only a few outstanding institutes offer continuing education courses.
New scenario	More opportunities for career growth.	Demands for Interdisciplinary programs are growing.	Demand for institutions to offer consultancy programs increases.
In-house problems	Most institutes need to modernize their resources.	Limited in-house facilities for undertaking part-time Ph.D. programs.	A few senior faculty can plan bid documents for consultancy programs.
Demands for high-quality faculty members with achievement motivation	They need outstanding faculty members who can plan interdisciplinary research programs.	Students prefer reputed-institutes with a better record of placements.	More opportunities are available for industry-sponsored research and development programs.
Things to be established	Should recruit leaders in various branches.	To be linked with the faculty developing associations.	Create linkages with local companies and micro small and medium enterprises (SMEs).

Table 2. Desired Focused Areas of Faculty Contribution

3.5. Threats

The threats are due to vulnerability, uncertainty, complexity, and ambiguity. Vulnerability indicates rapid changes in disruptive technology. As employers are not able to stabilize their production, they are not able to indicate the needs of fresh graduates. Ambiguity indicates uncertainty about getting sponsored research and development projects. These threats are presented in Table 3.

Threat	Vulnerability	Uncertainty	Complexity	Ambiguity
Dynamic changes	AI may replace many existing programs.	Not having authenticated demand for graduates.	Difficult to plan outcome-based programs.	Demand for seats in many branches is not known.
New opportunities	Industry 4 demands graduates with new abilities.	Not able to attract qualified and motivated faculty teams.	Getting seats for on-the-job training.	It is difficult to get sponsored research and development projects.

Table 3. Threats to be resolved

3.6. Threats Due to Toxic Leaders

Toxic leaders are usually selected by not following rigorous rules and norms. Most of them are self-centered and never focused on institutional development. They are corrupt and downgrade high-performing faculty teams. Inequality of opportunities in selection procedures limits diversity in engineering education. Toxic leader behavior significantly violates and negatively affects trust or well-being in higher education^{[18][19]}. Many toxic leaders suggest experts not select high-performing and service-oriented faculty members, they never nominate the faculty members to overseas universities, also reduce their salary, and never offer autonomy in undertaking sponsored projects. The faculty should resolve all toxic actions through legal methods^[20].

3.7. Professional Goals

The young faculty members have to create career goals to move from the pre-service stage to the chief executive officer level. This is presented in Table 4.

Stage	Goal	Needed Significant Cognitive Skills	Planned Outcome
Pre-service (Assistant Professor)	Should be capable of offering outcome-based courses.	Instructional system design Learning resources development.	Best undergraduate programs that attract the best candidates.
Inservice Middle-level (Associate Professor)	Should develop new programs.	Should continuously improve the abilities and skills of faculty members.	Should offer more industry-specific programs.
Senior-Level (Professor)	Should be able to establish interdisciplinary programs.	Should offer industry-relevant postgraduate programs.	Should get more reputation for services.
Chief Executive (Daen/Director/ Principal)	Continuous institutional development.	Strategic planning, best graduate placement, and consultancy programs for international development agencies.	Should focus on excellence and grant degrees without affiliation to universities.

Table 4. Planning to Achieve Professional Goals

Type of Program: Short-term Courses	Selection Process	Desired Experience	Desired Qualification	Outcome
Faculty development programs offered by the federal/central government	They have to apply through their employers.	Many programs are offered to fresh graduates.	The minimum qualification is a bachelor's degree in engineering.	This will help them to complete probation.
Content updating	They have to be nominated by their employers.	Around two years and should teach these courses.	A bachelor's degree in engineering.	They can plan postgraduate programs.
Curriculum Planning and Curriculum Evaluation	Again, the college has to nominate them,	Around two to five years.	B.E or M.E.	The completed faculty can plan new programs.
Higher Education Administration	Here also the employer has to nominate.	Tenured faculty with postgraduate qualifications.	M.E. or Ph.D.	Can apply for the Associate Professor post.
Institutional Development	Nomination by the employer is a must.	Tenured faculty at the Associate Professor's cadre.	M.E. or Ph.D.	Can apply for the Professor's cadre.
Internal Revenue Generation	Any cadre; should be nominated by the employer.	Around two years.	B.E./M.E./Ph.D.	It is the starting step in planning courses for employees.
Developing Instructional Materials	Any cadre also needs nomination.	Around two years.	Any degree in engineering or technology.	Can prepare textbooks/laboratory manuals/drawing manuals.
Developing Educational Video Programs	A limited number of institutions offer this.	Around two years.	Any degree in engineering.	Can prepare educational video programs.

Type of Program: Short-term Courses	Selection Process	Desired Experience	Desired Qualification	Outcome
Developing Multimedia Programs	A limited number of institutions offer this.	Around five years	Expertise in computer science.	Can develop multimedia learning packages.

Table 5. Beyond Doctoral Degree: Service Programs Advertised by the Government Departments. Many faculty development programs are available from sources. The faculty members have to diligently plan and complete them.

The following programs are available in many institutions. The faculty has to apply through their employers.

Type of Course	Universities	Purpose	Duration	Outcome
Courses under Sabbatical Leave	Global Universities	Enriched advanced courses	Six months to one year.	Expertise in selected areas.
Quality Improvement Programs under Ongoing Externally Funded Internal Development Agency	State Universities/ National Institutes of Technology/ Autonomous colleges/ Indian Institutes of Technology	To qualify for postgraduate programs.	Two years	Getting postgraduate degrees.
Internship in a Global University	Only the best - accomplished faculty members can get admission.	To get advanced exposure to selected courses.	Six months to one year	Get advanced cognitive abilities.
Massive Open Online Courses (MOOCs)	Any faculty can apply but they have to pay the fees.	To get mastery in selected areas.	Many vary from one month to two years.	Certificate to Master's Degree offered by international universities.
Internship in a Transnational Company	Limited opportunity.	To get needed skills in industrial processes.	From one month to one year.	To get relevant skills.

Table 6. Self-Directed Faculty Development Programs Planning

3.8. Leadership Opportunities in Higher Education

The following are leadership opportunities that are available for high-performing faculty members:

- Getting elected for University Academic Counsel
- Getting elected to Professional Associations
- Getting nominated to the Board of Studies
- Getting invited to Doctoral Committees

- Getting invited to deliver keynote addresses in seminars and conferences
- Getting invited to offer executive development programs by various companies and professional associations
- Getting invited to conduct industry-specific research and development program
- Getting invited to contribute a chapter to a textbook
- Getting invited to investigate a problem and offer a solution to a university
- Getting an opportunity to review an article for a conference
- Getting invited to guide an institutional development project under an International Development Agency
- Getting invited to a university as an expert member for capacity development, quality improvement, and efficiency improvement
- Getting awards based on outstanding contributions to research, publications, and generating revenue.

Planned Position	Professional Skills Needed	Enabling Factors	Outcome	Bottlenecks
A member of an Academic Council	Expertise in the academic development process and success in improving performance	Success in developing innovative courses, textbooks, item banks, laboratory manuals, workshop manuals, research articles, and developing programs.	Selected as a member of the Academic Council based on proven expertise.	The peer members have to vote based on the proven performance. Face competition from peers.
A member of a Doctoral Committee	Success in guiding interdisciplinary research scholars and publications in selected areas.	Received awards for best articles and interdisciplinary doctoral programs	Included was an invitee to review the thesis topic, recommend courses, and evaluate progress.	A few research guides may prefer doctoral committee members of his/her choice.
A member of the Board of Studies	Expertise in the branch of the proposed academic program.	Previous success record and innovation.	Will get more opportunities to guide the research scholars.	A few institutions may pose restrictions in selecting the members of the Board of Studies.
Elected to a Professional Association	In-depth expertise, qualification, and outstanding performance.	Members who have the best track records in publication, and industry services.	Developing more executives and employees to solve the industry problems.	Stiff peer competition.
Delivering a keynote address at a conference	Outstanding achievements in research, education, and services.	Wards received for publications in various research and development journals, reputed	Inspiration to other professional Members, creating a vision for further development.	Obstacles in nomination from parent institutions, and limitation of time.

Planned Position	Professional Skills Needed	Enabling Factors	Outcome	Bottlenecks
		leadership, and intellectual properties created.		
An expert in developing an institute under IDAs. ^[21]	Exemplary skills, achievements, and focus on the stakeholder needs.	Reputation due to the string of successful projects under various international development agencies.	Assured the development of an institute to enable the achievement of the vision.	Problems in getting nominations from the parent-institution
A member of the Board of Governors in an institution	In-depth expertise in strategic planning, convincing the Board and stakeholders.	Seniority, fast experience, and reputation due to successful completion of strategic planning.	Excellent institutional planning and industry-ready and outstanding graduates.	Restrictions due to limited support and opportunity.
A recognized professional leader in planning executive development programs for a company	In-depth expertise in human resources development, reputation, and focused outcome-based approach.	Excellent track record in completing complex executive development programs under various companies.	Successful executive development programs that will provide skills and abilities to continue.	Too many competing organizations, limited funds, and short time.
A recognized consultant to redesign a research-based production	In-depth expertise in interdisciplinary research and excellent track record.	Expertise in analysis-design-prototype development-testing-improving-mass production-marketing-maintenance-and recycling the process.	Competitive manufacturing, export, cost reduction, quality-improvement, poverty reduction, etc.	A limited faculty team needs up-to-date expertise in technology, quality improvement, and value analysis.

Planned Position	Professional Skills Needed	Enabling Factors	Outcome	Bottlenecks
Contributing a book chapter/ new book.	Expertise in instructional material development.	Content specialization, teamwork, editing, and project management.	Up-to-date textbook.	Limited expertise.
Evaluate an administrative problem of a university and offer an excellent solution.	Higher education administration, problem analysis, rules, norms, laws, and human resource development. Organizational development.	Proven track record. Success in organizational transformations. Problem analysis. Faculty development. Resources improvement. Financial management.	High-performing institute. High return on investment. Assured human capital and knowledge capital.	Limited sharing of causes, no transparency, and absence of open discussion. Influence of external factors.
Peer review research articles for a journal or conference	In-depth expertise in research paper writing and content.	Reputation, excellent track record. Knowledge in interdisciplinary research.	Excellent articles that contribute to advances in design, production, and maintenance.	Limitation due to narrow vision.
Plan an institutional development plan under an International Development Agency (IDA)	Training needs assessment, identification of resources, qualified faculty members, and planning flexible and outcome-oriented programs.	Excellent track record. Rules of IDA. Project management. Stakeholder management. Financial management.	Excellent institution to meet the new technology and needed human resources.	Shortage in needed qualified faculty members. Not focused on the fast-changing technology.
Offer solutions to an educational	Identification of needed human	Excellent track record in capacity	Well-designed departments,	Outmoded planning, severe shortages in

Planned Position	Professional Skills Needed	Enabling Factors	Outcome	Bottlenecks
institution for capacity development ^[22]	resources, skills, and cognitive abilities.	development, human resource planning, and development.	faculty members, outcome-based curricula, and instructional resources.	faculty members. Limited resources.
Receiving national and internal awards	Highest qualification, accomplishments, and contributions to the nation.	Best performers at the international level. Excellent presentation of CV. Support from the leaders.	Assured human capital and knowledge capital.	Limitation in accomplishment. Lack of vision.

Table 7. Strategic Planning to Reach Desired Academic Position

3.9. Reframe Your Goals based on the invasion of disruptive technologies

Periodically evaluate your accomplishments, and contributions to human capital and knowledge capital. Compare your CV with that of winners and identify the shortages. Plan to get more citations for your papers. Publish your outstanding articles in reputed journals. Try to get more expertise through lifelong learning. Plan to internships in reputed universities. Fix new goals and plan to achieve them.

3.10. Vision for Accelerated Growth

Identify the gaps in planned growth and look for alternate opportunities. Plan to learn new areas through external attachment in well-reputed institutes under sabbatical leave. Join a team that is undertaking research in the desired areas.

3.11. Create a Revised Mission

Now identify needed online courses and register. Plan for new consultancy projects that are available under various International Development Agencies. Develop appropriate technical proposals and

financial proposals. Negotiate well and win the project. Try to complete it well before the deadline. Claim the due amount and settle the account within one month.

3.12. Lifelong Learning

Undergoing Various Professional Development Programs based on the Fast Growth of Technology: There is no end to acquiring new cognitive abilities to develop needed innovative products and services. Most of the Education Ministry creates sufficient earning opportunities through the World Bank, the Asian Development Bank, the United Nations Development Program, and many bilateral agreements with advanced nations. These opportunities should be utilized.

Interdisciplinary Postdoctoral Programs are also available as a part of quality improvement under many development projects. Even though there will be more competition, a well-qualified faculty will have more chance to get selected.

3.13. Providing Service

A well-qualified and motivated faculty team should utilize their cognitive ability, and fine skills to offer service to the micro, small, and medium enterprises (MSMEs), government engineering departments, and other educational organizations. This not only offers needed services but also generates internal revenue for the institute and the members of the project team. This is an indicator of the impact of qualified faculty teams.

Service	Opportunity	Client	Program	Funds
Continuing Education Programs for Employees	Introduction of new technology.	MSMEs	Based on the needs of organizations.	Clients have to bear.
Establishment of Continuing Education Department	Fast changes in design, new products, & project funds.	Government Departments	Based on the needs of employees.	Are to be paid by the department.
To upgrade production processes.	Introduction of new fast-producing machines.	Local Private Companies	Employee training	Companies have to pay.
Consultancy services as per the terms of the reference (TOR)	Export to various countries as per the standards.	Transnational Companies	High-end consultancy program.	Clients
Faculty development, the establishment of new programs, and Institutional development.	New projects under an International Development Agency	Universities, Professional Colleges, Sector specific development /training organizations	Based of TOR	From the projects
Faculty development, Curriculum Development, Examination Reforms. Learning Packages Development, and Multidisciplinary Research	Under a National Educational Policy	Colleges	As per TOR	Ministry of Education
Training rural youth, out-of-school kids, and adult learners.	Skill development programs	Ministry of Skill Development (MSD)	As per TOR	MSD

Table 8. Possible Services

3.14. Getting Recognition from Various National Associations and International Organizations/ Societies

The outstanding engineering faculty members strive to become fellows of national and international academies. They need to apply through a nominator who is a member of these associations. Their outstanding performance will assist their election.

Title	Association/ Academy	Needed Achievement
Fellow of the Indian National Academy of Engineering (FINAE) ^[23]	Indian National Academy of Engineering	Notable contribution to engineering
Fellow of Indian National Science Academy (FINSa)	Indian National Science Academy	Notable contribution to science
Member of Research Gate	Publishing research papers, books	Global publication of original articles with DOI
Academic Edu	Publication of research papers, books	Global publication of original articles, and books with DOI
Fellow of Indian Engineering Association (FIE)	National Association in Engineering	Recognized national contribution by research, teaching, and projects
Fellow of the Indian Geotechnical Society	National Geotechnical Society	Outstanding research contribution to geotechnical engineering
Fulbright Fellowship	The US government-sponsored fellowship	Doctoral Degree and outstanding contribution to knowledge
Educational Honor Society	Pi Lambda Theta Pi Delta Kappa Etc.	The faculty needs to be nominated by a member of these Societies.
Google Scholar	Google Scholar tracks the publications and citations by various researchers based on web postings. “h” index and “i” indexes are calculated and displayed on the web.	The faculty members should choose the best journals and publish their articles on them.

Table 9. A few National/International Academies/Associations

3.15. Offering Courses through Foreign Universities

Many foreign universities will invite outstanding faculty members to offer lectures to their students. This is based on the publications in the international journals or conferences. Hence, every faculty should get invitations based on their contributions.

3.16. Conducting Workshops and Peripatetic Seminars under IDAs

Many international councils may invite institutions that are their associated institutions to conduct peripatetic seminars and workshops for senior educationalists from other countries in the region. Each institution depends on outstanding faculty members who can offer innovative workshops and seminars.

3.17. Conducting Seminars, Symposia and Conferences

Faculty members could plan national and international symposia and conferences on the advancement of selected themes. This reflects the global contributions through research and development.

3.18. Offering Consultancy Projects as an Intrapreneur to Various International Development Agencies

An outstanding faculty member could develop a plan for a set of consultancy projects under various International Development Agencies to set an example as an Intrapreneur and develop many faculty members and postgraduate students.

3.19. Offering Diverse Global Faculty Development Programs

Many developing countries need appropriate country-specific long-term faculty development programs for vocational teachers, technician teachers, and engineers. Only the best programs will be selected by IDAs. Hence, the institute could plan a center for diverse faculty development programs. The members are to be trained in training needs analysis, developing outcome-based curricula, and implementing with effective participation of the trainees.

3.20. Overcoming the Obstructions and Bottlenecks

Many institutes have only around 50% of the sanctioned faculty positions, limited resources, and no mission for focused programs. These are obstructions for improving the performance of the faculty members. All these can only be solved by the Board of Governors and the Ministry of Education. Many toxic directors of the institutes may also offload letters of invitation to external organizations. A few more may not approve of many innovative programs, conferences, and development activities.

3.21. Limitations in Planned Achievements

- Shortage of outstanding faculty teams
- Refusal to approve the bidding for consultancy projects under IDAs
- Restrictions in offering diverse global faculty members
- Restrictions on developing executive development programs
- Centralized decision making
- Refusal in nominating faculty members to undergo internships even though a foreign government reimburses all expenditures

The outstanding faculty team becomes helpless due to many restrictions, shortcomings, and shortages in resources.

3.22. Systematic Review of Shortage of Resources and Qualified Faculty Members

Many standing committee members of parliament would visit the institutes and collect feedback on achievements and shortages. Many governments prepare National Educational Policies and come up with additional funds to improve the resources and faculty members. Such policy development has to be utilized for development. The Government may obtain soft loans from International Development Agencies which will provide needed funds for institutional development.

4. Discussion

Many outstanding engineering faculty members could not reach planned career growth due to a lack of strategic planning, not planning for professional leadership positions, and not planning to overcome threats. They have to plan beyond doctoral degrees. In the absence of counseling, coaching, and mentoring, self-directed learning alone will lead them to reach their desired academic positions.

Many leadership opportunities in higher education depend on acquiring outstanding accomplishments. This needs strategic planning, and reframing the career goals based on the innovations of disruptive technologies. They have to plan lifelong learning based on many emerging opportunities. Further, the outstanding faculty members plan to offer excellent services and get recognized by national and international organizations.

5. Conclusion

Reaching the highest academic position even by outstanding and well-accomplished faculty members is not easy. This research study provides a “Research-Acquire-Adopt-Transform” model for well-accomplished and motivated faculty members. SWOT analysis can be used to identify the strengths, weaknesses, opportunities, and threats. The outcome of faculty development should offer research results, needed educational programs, and highly useful services to society as a whole. Threats are to be overcome. Every competent and well-accomplished faculty member should plan smart goals to reach the highest academic position. Planning beyond a doctoral degree is very essential in many academic areas. Self-directed learning will lead to higher cognitive abilities and fine motor skills. As new disruptive technologies impact industrial development, the faculty members need to reframe their goals. Lifelong learning is a proven methodology. The outstanding faculty members should plan appropriate services to the community as a whole. Further, they have to be recognized by various national and international professional associations. All these will be useful under distributed leadership only but under toxic leaders.

5.1. Limitations

This study is based on the success stories of around 100 well-accomplished leaders who planned strategic plans and offered outstanding services out of 1000 possible leaders. Research-Acquire-Adopt-Transform (RAAT) is a very high potential model but needs further study in different nations and cultures.

5.2. Suggestions for Further Study

It is suggested to undertake further research studies for various professional programs under various cultures. Other factors that affect the approach are the government policies, and people's readiness to

continuously acquire abilities and skills with necessary support and scaffolding from the administration.

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