Fergusson College (Autonomous), Pune
Academic and Administrative Audit Report
Duration 2019 – 2021
Dates: 18th and 19th January, 2022

20th Jan 2022

REFERENCE: Mail from the Fergusson College, dated 27th December, 2021 requesting Prof. Pandit Vidyasagar, Former Vice Chancellor; Swami Ramanand Tirth Marathwada University, Nanded, Prof. Avinash Kumbhar , Professor, Department of Chemistry, Savitribai Phule Pune University, Pune ., Dr. Hrishikesh Soman, Principal, Symbiosis Colleges of Arts and Commerce, Pune and Dr. Chandrakant Rawal ,Former Principal, Brihan Maharashtra College of Commerce, Pune to constitute their committee for conducting Academic and Administrative Audit of the College for the academic years 2019-20 and 2020-21. The committee met at Fergusson College for this purpose on 18th and 19th January 2022. All the heads made their presentations before the committee.

THE REPORT

Department Name: Economics

Suggestions
Points discussed:
• The experts sought information on how bloom's taxonomy is incorporated in OBE. A detailed explanation was given by the representative of the department.
Improvement:
• Quantitative data in terms of percentage must be provided for student progression and placement for UG and PG programmes separately
Recommendations:
• The department can consider designing a course on Econophysics.
• Econometrics may be introduced as an option with Maths. Department
• Take up professional corporate training or consultancy.
• Internships has to be promoted
• No. of students in UG and PG are more, explore potential for overall development.
• Maintain record of student progression and placement

Department Name: English

Suggestions
Points discussed: • The functioning of the DES Language Development centre was discussed elaborately. It can promote interdisciplinary activities
Improvement: • Mention details of publications.
Recommendations: • Language development centre needs to be run under Fergusson College name if the due credit is to be taken particularly for NAAC. It can be an outreach activity of the department. If possible, restructure this for the benefit of Fergusson College.   • Collaborate with other language dept. like Marathi etc   • Promote consultancy   • Can Language centres be used for slow learners   • Promote Research activities as English dept. has research centre   • Take Interdisciplinary activities   • Internships for students with national level organisations   • Maintain record of student progression and placement

Department Name: French

Suggestions
Points discussed: • Student strength of the department was discussed.   • It is appreciated that French is taught at two different levels.   • Innovative Teaching pedagogy (games) to teach students is good
Recommendations: • Placement activity to be reflected upon   • Linkages to be formalised   • Maintain record of student progression and placement

Department Name: German

Suggestions
Points discussed: • The experts appreciated the activities conducted by the department.
Recommendations: • Short term courses like one month duration can be offered   • Formal MoUs can be signed with institutes such as Engineering colleges for students/professionals travelling to Germany for work.   • Interdisciplinary activities can be taken up   • Placement activity to be reflected upon   • Collaborate with the institutes where students are undertaking projects/internship   • Maintain record of student progression and placement

Department Name: Geography

Suggestions
Points discussed:
The experts appreciated the activities conducted by the department.
Recommendations:
- Some components of geography can be included in the geology syllabus to make it more comprehensive and interdisciplinary.   - Why is this called BA geography as it's taught at a special level? It can be clubbed with some other subject. College can decide on this point.   - What is the need for a separate BoS for Geography?

Department Name: Hindi

Suggestions
Points discussed:
The experts appreciated the activities conducted by the department.
Recommendations:
- Publications should be in UGC- CARE   - Promote internships for students   - Have formal linkages/ collaboration   - Promotion of interdisciplinary research   - Maintain record of student progression and placement

Department Name: History

Suggestions
Points discussed:
- The experts appreciated the activities conducted by the department.   - The experts tried to understand the role of History in museology.
Improvement:
Proper documental record needs to be maintained for best practise relating to explaining the history of college to visitors of Fergusson College.
Recommendations:
- A project on the history of Pune city can be conducted by the department.   - Promote publications and publish in UGC -CARE journals   - Promote internships   - Document the activity of students explaining the history of our college to the guests.   - Short videos can be made on the history of Pune, College and historical sites in Pune collaboration with the Media department.   - Student progression and placement should be captured

Department Name: Marathi

Suggestions
Points discussed: The experts stated that the Marathi department has a lot of potential in terms of maximum number of appointed faculty against sanctioned posts, qualifications of faculty and availability of space. They recommended that good use of this potential must be made for the development of the department.
Recommendations: • College has a variety of language departments and all language departments can together offer a course on translation.   • Department may initiate कार्यालयीन मराठी certificate course   • Need to have hand holding activities with organisation working in the field for Marathi language   • The department can introduce short-term courses on Journalistic writing, Creative writing, etc.   • Conduct workshops for news channels, media houses particularly to improve the quality of language currently used in media.   • Offer internships at various projects undertaken by Maharashtra state government.   • The department for dictionaries/glossaries of scientific and technical terminologies in Marathi can undertake projects.   • Social Outreach activities be undertaken e.g. workshops for painters Workshop for teachers of PMC   • Take Media department help during workshops to enhance multimedia involvement.   • Take up interdisciplinary projects with the Arts and Science department.   • Apply for funded projects as the Government promotes Marathi as official languages.   • Take up workshop for non-teaching staff for drafting letters and circulars.   • Maintain record of student progression and placement

Department Name: Philosophy

Suggestions
Points discussed:
Recommendations: • Logic and Philosophy together can be offered as a bunch of courses where logic is mandatory for students opting for philosophy.   • Formal linkages can be made with CTK (*Chalo Think Kare*)   • Social Outreach can be done   • Philosophical Counselling seems interesting and it can be promoted   • Student progression and placement should be captured

Department Name: Political Science

Suggestions
Points discussed: • Data concerning student progression does not seem to be impressive if compared to the overall student strength of the department. • On the individual level the outreach of the department seems impressive, however that does not reflect in the departmental outreach and effectiveness.
Recommendations: • A program for developing career paths of competitive exam aspirants can be designed. • The department, at the same time should conduct activities conducive in breaking the myth of competitive exams. • Conduct model united nation • Relevant acts should be taught to People's representative • Student progression and placements should be captured properly. • Conduct workshops e.g. on Political Economy • Pre elections surveys should be conducted with students' participation. • Collaborate with Media houses • Internships should be provided to students • Department can do a lot for Social Outreach programme • Student progression and placement should be captured

Department Name: Psychology

Suggestions
Recommendations: • The department could go for the option of offering MA by research for Psychology apart from MA by paper. • Department may explore possibility of organizing corporate Training and consultancy • Start appreciation and recognition for students' achievements as a department initiative. If done for five years consistently it can be a best practice of the department. • A project relating to the Happiness Index of Pune city can be taken up by the department. • Develop and upload e-content • Student progression and placement should be captured

Department Name: Sanskrit

Suggestions
Points discussed: Student strength of the department was discussed. The experts wanted to know the number of international students opting for Sanskrit.
Recommendations: - Utility of Sanskrit language towards development needs to be focussed.   - Sanskrit language must be popularised by delineating it from religion.   - Sanskrit for beginners and advanced must be formally offered.   - Certificate courses can be started. Evening courses for senior citizens can be introduced.   - Bridge course can be started   - Sanskrit can be offered for international students   - Collaboration and Internships be promoted   - Student progression and placement should be captured

Department Name: Sociology

Suggestions
Points discussed: Some suggestions pertaining to the PowerPoint presentation of the department were given such as maintaining the sequence of slides, mentioning student strength and progression data, etc.
Improvement: Student diversity does not reflect in the activities of the department. Many more activities can be conducted.
Recommendations: - The experts recommended that the department should not limit themselves to the structural aspects of sociology   - The department could conduct several activities in collaboration with other departments such as Political science and Psychology.   - Bridge courses can be offered for international students instead of remedial/extra lectures.   - Student progression and placement should be captured   - Create a database so that Informed choices about activities can be offered to students

Department Name: Animation and B.Voc. Digital Art & Animation

Suggestions
Points discussed: - Programme fees and annual budget were discussed.   - Students have done excellent projects.   - Take feedback from industry people for short films/animations developed by students   - Check copyright issues, give credits wherever necessary
Data Collection: Collect and present Data to indicate how many students have started their own start-ups and include them in student progression.

Department Name: B.Voc. Media and Communication

Suggestions
Points discussed: - Check curriculum revisions, syllabus.   - Check credit distribution, basic guidelines of UGC and NSQF, show NSQF guidelines and check if it is being followed properly.   - Reflect industry experts as strength towards strengthening teaching-learning activity.   - Documentaries made can be put up on college website or link should be shared.
Data Collection and Representation: - Collect student progression data properly   - Represent Student progression in terms of   - Higher Education   - Jobs   - Free-lancing

Department Name: Biotechnology

Suggestions
Points discussed: - Laboratory set up and cost of infrastructure was discussed.   - Number and nature of electives offered to students   - Percentage of girls' students is maximum   - Future plan of the department: - Collaborating with industry   - Introducing integrated M.Sc. Program   - Current lab infrastructure is quite good. So if Laboratory gets accreditation, consultancy can started
Recommendations: - Establishing research centre   - Formal collaboration with research institutes   - Videos created by Teachers and students should be published on social sites, YouTube   - If videos are available on online platforms, quantify the numbers of views.   - Identify possibility of inter department credit transfer between life sciences departments like Microbiology and Biochemistry

• Clubs can be reflected as comprehensive model in Teaching-Learning
• Interdepartmental collaborations should be done for research for good publications.
• Students who are excelling in their fields should be captured
Data Collection and presentation:
• **Data should be to presented in quantitative form**
○ Podcasts on Amazon
○ Videos by Teachers
○ Videos by Students

Department Name: Botany

Suggestions
Points discussed:
• Curriculum revision
• Total staff, teacher to student ratio
• Demand ration of the course
• Where is the department at National level?
• Best practices in the department
• e- Content Development
Improvement:
• Add last two years data 2019-20, 2020-21 to the presentation
• For criteria 1 and 2, mention about which changes have been done and why (no. of new courses introduce, courses having skills, employability etc., teaching-learning methods used etc.)
• Add separate slide and focus on syllabus revision
• Add data in tabular form
• Links to be visible more clearly on the slides
• Make e-content available through the college website.
Recommendations:
• Apart from teaching what are the national level plans by the department
• Identify Best practice
Data Collection:
• Know demand ratio of the course
• Student progression

Department Name: Chemistry

Suggestions
Points discussed: • Check newly introduced course   • Activities taken are very less, webinars could have been conducted.   • Why PG projects are for Biochemistry and not Organic and Analytical Chemistry for all students?   • It is better to quantized all activities done for proper presentation   • Feedback on curriculum by teachers taken or not?   • Consultancy work should be taken up   • Are Question papers checked by externals? Follow the practice.   • Output of the department is not the number of faculty.
Improvement: • Increase number of activities: workshop, guest lectures for students   • Projects should be included in Organic and Analytical Chemistry in final semester like all other PG courses in college.   • Department should become vibrant in terms of activities and student progression.   • Consultancy opportunities should be explored.
Recommendations: • YouTube links and number of hits for channels developed by faculty should be noted down and reflected quantitatively   • Present data of departmental activities, student activity, progression etc. in numbers.   • Update profile of all faculties and measure output of faculty   • Manuscript writing should be mentioned as Best Practices
Data Collection: • Student progression should be expressed in numbers properly and it should be presented better   • Present UG and PG progression separately in a statistical way.

Department Name: Computer Science

Suggestions
Points discussed: • How does the Dept of Computer science contribute in managing ICT across the college?   • Under the social outreach initiative, CS students can take initiative in activities like training elders visiting the campus; helping them with using technology in connecting people. Some short- term training on ICT should be started for people who don't know the technology - this can be outreach activity of the department   • Plans for establishing a research centre.
Recommendations: • Faculty should apply for Ph.D. guides   • Best practise should be identified properly   • Faculty can help others departments in college in management of ICT   • Overlapping of courses among all branches of PG offered by the department should be identified and common courses can be taught by competent faculty
Data Collection: • Represent student progression in a quantitative format

Department Name: Electronic Science

Suggestions
Points discussed:
• Electronics Science faculties have developed almost 720 modules, previous 160 modules were approved by UGC, quality control is already in place for rest module creation. • Expenses shown by Electronics dept 2018-19 => 18 Lakhs 2019 - 20 => 6 lakhs   2020   - 21 => 4 Lakhs for lab + 2 lakhs for purchasing Software • Credit sharing with Physics departments for few courses may be explore. • Considering NEP where the department stands?
Improvement:
• Consultancy opportunity
Recommendations:
• Collaboration with Physics department • Electronic Science department should lead in Incubation • Introduce 1 or 2 credit course (related to Posters shown) under social outreach program • Separate student progression data for UG and PG should be shown • Consultancy services should be started • Improve collaboration with other departments in campus • Tie up with societies for disabled to provide them some assistance

Department Name: Environmental Science

Suggestions
Points discussed:
• Present Plantation drive in a unique way for best practice. • Show teachers training under social outreach program • Active MOU and LOI s discussed
Recommendations:
• Introduce course on Project Management • Best practises can be highlighted in unique way. Activities which are consistent should be mentioned there. • College's Environmental audit should be done by the faculty • Biodiversity data link should be made available on college website
Data Collection:

• Present student progression quantitatively
    o Students going for higher education
    o Students taking jobs
    o Students starting consultancy.

Department Name: Geology

Suggestions
Points discussed: • Outcome based evaluation • Choice based credits • Geotag photos • Outreach activities • Best practices of the department • Long-term planning by the department
Improvement: • Add information of the years 2019-20, 2020-21 • Add Geotagged photos wherever possible • Carry out a greater number of outreach activities • Add a slide about outcome-based mapping.
Recommendations: • Introduce effective and unique program after thoughtful discussion about best practices by the department • Carry out long-term planning on departmental contribution in geologically important national level problems

Department Name: Mathematics/ IMCA

Suggestions
Points discussed: • Rubrics should be followed for Seminars taken during CE • Experts sought clarification regarding the possible use of 'experiential learning' in a subject such as mathematics. Teachers explained using examples how it is being implemented in classes.
Improvement: • Pre- Placement activities cannot be considered as best practise. • Technical sessions with alumni should be included in Alumni related activities rather than best practice.
Recommendations: • Rearrangement/restructuring of courses can be done to avoid overlaps such as in the Computer Science/Application component in Mathematics courses and vice-versa • The experts were of the opinion that the BA Mathematics course is a highlight of the department and should be popularised and promoted actively. They also recommended that a PG course in mathematics be introduced in the Arts faculty. (M.A. Mathematics) • keep data and proof of continuous peer training
Data Collection: • Quantitative data needs to be given for publications, student progression, placement, etc. • Organise data for student progression and placement separately for UG and PG

Department Name: Microbiology

Suggestions
Points discussed: - Nature of the Dry lab was discussed.   - Possibility of inter department credit transfer between Life sciences departments and other department programs   - Common pools of subjects should be encouraged
Recommendations: - Establishment of research centre   - Formal collaboration with ARI and other such national institutes should be done.   - Experts can be called from renowned industries and institutes like Serum and tap them for formal collaboration if not MoU   - Check slide no.9 and make it more visible for further presentations.   - Books published with standard publishers should only be included.   - Best practices should be reconsidered. Only those activities which are consistent and unique should be mentioned, others are part of mandatory activities

Department Name: Physics

Suggestions
Points discussed: - Implement Choice based Credit system and offer electives.   - Documentation of Data should be in a quantitative manner.   - Organisation of national/international conferences   - Amount of grants utilised in procuring equipment and give their numbers.   - USP of department was asked
Improvement: - Differentiate between international/national/state level conferences organised by department, Mention about best things in teaching and learning   - After Autonomy, what major changes introduced in criteria 1 and 2 of NAAC (new courses introduced, courses focussing on employability, skills, entrepreneurship etc., teaching, learning etc). Emphasis in Teaching - Learning be mentioned.   - Add separate slide about industry connect   - DBT STAR activities to be mentioned   - All photos should be geotagged   - Increase Publications   - Linkages and collaborations should be increased and data should be maintained.   - Mention Ph.D. scholars' information (ongoing/completed)   - Data to be organised properly
Recommendations: - Focus on research projects, publications and compile data in quantitative form. Include bibliometric information.   - Carry out SWOC analysis, feedback analysis etc.   - SEI, Physics Frontiers, Dimensions etc. can be the Best practises as its being taken consistently.   - SEI can be highlighted as SOEC   - Organise National/ International conferences - online/offline

• Students' activities, their presentations in conferences should be mentioned in quantitative form.
Data Collection:
• Add qualitative data in tabular or graphical form wherever possible

Department Name: Statistics

Suggestions
Points discussed:
• PG program, B.Sc. Data Analytics may be introduced **Response:** M.Sc. Statistics will be started 2021 - 22. Syllabus is ready and approved by BOS. • Regarding KPIT consultation, what is the amount of consultancy? **Response:** 4 Students will get an internship. • Budget of Departments **Response: 5 Lakhs,** Funds utilized **till** now are **75%**
Improvement:
• Research • Social Outreach Programme
Recommendations:
• The Department of Statistics should offer assistance to other departments or society in research work wherever Analytical expertise is needed.

Department Name: Zoology

Suggestions
Points discussed:
• Overall improvement in presentation • Access of museum to common public and other students : make information available on website • Mini projects and transfer of credits should be implemented (eg. Python course) • Research Publications
Improvement:
• Add quantitative data in tabular or graphical form • Add data of 2019-20, 2020-21 • Add more slides about students' activities • Give more focus on mentoring • Give credits to mini projects and transfer credits • Focus on Scopus indexed publications & add citations • Mention only the activities conducted instead of giving NIL data
Recommendations:
• Add all subject related information to enrich the data about the department • Include museum collections in teaching-learning practices • Put information about museum on college website and allow common people to register and visit museum

Examination Section

Suggestions
Points discussed: 1. Exam room place, security system in terms of accessibility and safety measures were discussed   2. Process of collecting grievances and redressal mechanism   3. Rules for malpractices and maximum punishment   4. Grace rules   5. Audit of question papers and CAP   6. BAR code on Answer sheets   7. Saving of Data related to exams   8. Quality check of papers
Improvement: Security and Safety, Log book
Recommendations: 1. Exam department should be at a different place with separate entry.   2. There should be an electronic security system and register to monitor movement   3. Safety measures/features on the mark sheets should be appropriate.   4. Separate server should be there for the Exam data.   5. Conduct proctored online-exams   6. College can decide the evaluation method on its own. It needs to be informed to SPPU and records to be maintained at college level.   7. Quality control/check of question papers should be done where few things related to difficulty level, syllabus coverage should be monitored. Workshop/Orientation can be planned on how to prepare question papers based on difficulty level and Syllabus coverage.   8. Exam department should do the analysis of results and give feedback to teachers.   9. Policy should be made to check quality of MCQs   10. CGPA model to be worked upon

Department Name: Career Facilitation Center (CFC)

Suggestions
Points Discussed: • How many MOUs are operational?   • Represent data as Duration of MOU, No. of activity conducted and no. of internship offered.   • Outcome of the MOUs should be highlighted.   **Response:** Currently 10 MoUs are functional.
Recommendations: • Data to be presented in Statistical format   • Mechanism to be developed to collect appointment letters or proofs   • Placement % of PG is only around 10%, so off campus and on-campus data should also be merged to monitor the placements

Department Name: National Service Scheme (NSS)

Suggestions
Points Discussed: • Good activities done by NSS team   • Which activity NSS does consistently for many years? Are any such examples there?   • Awards/prizes applied for by NSS   • Beneficiary information about the drives conducted - e.g. no.of beneficiary during food donation drive
Recommendation   • NSS unit should apply for Awards at different levels: Best NSS unit, Best student volunteer etc.   • If students participated at state, national level, it should be presented in tabular form.   • Statistics of the activities conducted every year should be given in tabular form   • Quantification of data: e.g. No. of activities conducted per month, no. of volunteers participating per month/per programmes   • Data/statistics of students who got extra credits due to NSS work should be maintained and presented.

Department Name: National Cadet Corps (NCC Army wing)

Suggestions
(Army wing presented)   • NCC should carry out program with government agencies or department   • NCC as one unit be presented   • Study centre for NDA, CDS, SSB may be established

Department Name: Social Outreach and Enabling Centre

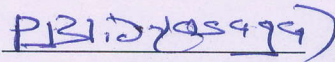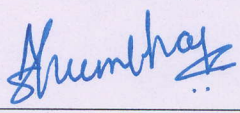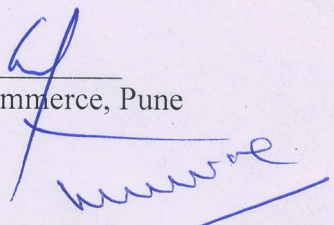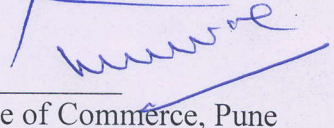| Suggestions |
| --- |
| SOEC/SATHI work appreciated.
 Suggested that number of collaborations with NGOs be increased. |

Department Name: Internal Quality Assurance Cell

Suggestions
Points Discussed: • Quality initiatives taken • Promotion of interdisciplinary learning • STRIDE activities • Total amount as SEED money from overall budget available • How much funds the college/parent organization is giving apart from budgets and from various schemes. • You tube channels of college can be made in which a number of activities and college related things can be uploaded.
Recommendation • Maintain quantitative data of all department with acceptable proofs. • Compliances of previous NAAC cycle be included. • STRIDE should be utilised for the benefit of the Social Sciences group also and promotion of inter/transdisciplinary activities. • Extract maximum benefits from different collaborations • Sign MoU with established colleges and institutes apart from the smaller college where FC can play the major role as mentor. • Formal collaborations with IISER, NCL, NCCS etc should be done. • Mention informal collaboration also if some good activities conducted. A letter in this regard can be obtain from Lupin, NCL etc. • Document Funds utilisation with college /institute contribution in tabular form

Amount	Scheme	Scheme contribution	Institutional contribution

Administrative Section

Observations and Recommendations:
• Service Book of all Employers are updated • Confidential Reports of non- teaching staff members are in place. • Salary Register up-dated, some staff needs to sign it regularly. • Budgetary provisions for all departments need to process and its utilisation need to be monitor. • Record of Utilisation of funds available under various Government Schemes, well maintained. • Update biometric Attendance. • Maintain minutes of all statutory committees like Anti-Ragging Committee, as per regulations. • Staff Profile with work description needs to display at prominent place. • Make adequate, advanced computers available considering office requirements. • Staffing Pattern needs attention. • Structural Audit carried out in 2017. • Fire alarms in science laboratories. • Administrative Department may present their work and achievements through Power Point Presentation.

	Overall Recommendations
1	College should develop a credit transfer policy and encourage students from other academic programmes to opt for other departmental electives.
2	Research Papers be published in SCOPUS, UGC-CARE Journals and should be proportional to the number of PhD teachers/ guides.
3	Formal collaborations with different national institutes like IUCAA, IISER, NCL and other important institutions concern with arts faculty to be established.
4	Quantification of data to be followed by all departments (for metric under all seven criteria)
5	Departments should maintain data regarding student progression and placements separately for UG and PG and work towards improvement in suggested matters.
6	Departments should maintain a record of amount spent towards purchase of instruments/ equipment/ special facilities and maintenance.
7	Involve and educate all the department teachers in audit process and departments to be provided with technical support for data presentation.
8	Every department to make an effort towards creating opportunities for consultancy.
9	College should promote interdepartmental collaborations for teaching and research.
10	IQAC to train departments in understanding and identifying Best Practices.
11	The work done by the college in the area of consultancy is limited, needs special attention.
12	Geo-tagged photographs showing utilization of infrastructural facilities and various activities within and outside campus should be kept ready year-wise.
13	Auditor's certificate for utilization of the budgeted amount for Library, Maintenance and Infrastructure augmentation and other places to support the responses.
14	Students' representation on academic and administrative committees may be increased
15	Inclusive Feedback systems need to be introduce and implemented.
16	Each Department may undertake Gap Analysis and prepare POA, Plan of Action to be implemented.
17	Considering volume of data and requirement of Autonomous college, college need to procure separate server on priority basis.

1. Prof. Pandit Vidyasagar
   Former Vice Chancellor;
   Swami Ramanand Tirth Marathwada University, Nanded

2. Prof. Avinash Kumbhar
   Professor, Department of Chemistry, Savitribai Phule Pune University, Pune

3. Dr. Hrishikesh Soman
   Principal, Symbiosis Colleges of Arts and Commerce, Pune

4. Dr. Chandrakant Rawal
   Former Principal, Brihan Maharashtra College of Commerce, Pune