

St. Ann's College for Women

(Autonomous), Affiliated to Osmania University
Accredited by NAAC with A⁺ Grade (3rd cycle), CPE by UGC
Mehdipatnam, Hyderabad.



CRITERION - VI

GOVERNANCE LEADERSHIP AND MANAGEMENT

6.3 Faculty Empowerment Strategies



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6.3.2

Percentage of teachers provided with financial support to attend conferences/workshops and towards membership fee of professional bodies during the last five years

**6.3.2 Financial Support to attend academic events and membership fee of professional bodies-List of Teachers and Certificates
2019-20**

S.No	Name of the Teacher
1	Dr. Smita Asthana
2	Ms. Devyani Dixit
3	MsK.Rajeswari
4	MsP.Prashanthi
5	Ms.Popy Devi Nath
6	MsT.Pushpa Latha
7	Dr. P. Usha Shri



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8	Ms.M. Prashanthi
9	Ms.T. Bhavani
10	Mrs. Santhoshi Rupa
11	Dr. Narjis Fathima
12	M.Sujatha
13	Mrs. Santoshi Misra
14	Mrs.Kedarini
15	Mrs. Jyothi.Ch
16	Ms.A.Mary Francina
17	Mrs. Dhivyakumari. G
18	Mrs.AM Sylaja
19	Mrs. D. Divya
20	Mrs. Juveria Azmath



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21	Dr. Tasneem Jahan
22	G. Ramya Sree
23	Dr.D.Sarala
24	Ms.D.Srikala
25	Mrs. J. Saujanya
26	Mrs. N. Supriya
27	Mrs. P. Sirisha
28	Mrs. Mahitha Davala
29	Mrs.V. Krishna Priya
30	Dr. Nida Hazari
31	Mrs.Naveena.K
32	Mrs.P.V.Neeraja
33	Mrs. T. Anuradha



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34	M.Maria Lavanya
35	Mrs. Bhramara Sree
36	Dr.Mithlesh Jayas
37	Ms.Beverly John
38	Ms. Lungmila Longvah
39	Mrs.B.Japamala Rani
40	Ms.Sumitha
41	Ms Naga Lakshmi
42	Ms. Sridevi Kasavajjhala
43	Mrs.D.Sujatha
44	MsNasreen Begum
45	Mrs.Y.V.Phani Kumari



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2. Ms. Devyani Dixit





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3. Ms. K. Rajeswari



4. Ms. P. Prashanthi





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5. Ms. Popy Devi Nath



6. Ms T.Pushpa Latha





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7. Dr. P. Usha Shri

*IOSR Journal of Environmental Science, Toxicology and Food Technology (IOSR-JESTT)
e-ISSN: 2319-2402, p-ISSN: 2319-2399, Volume 13, Issue 8 Ser. 1 (August, 2019), PP 66-70
www.iosrjournals.org*

Structural Changes in Stomata in Plants Exposed to Air Pollution

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Abstract: Air pollution, is now almost inescapable component of urban life affecting both plants and animals equally. The changes in the epidermal configuration reveal marked alteration in number of stomata, epidermal cells and stomatal indices in leaf samples collected from polluted zones that can be used as biomarkers of air pollution. These pollutants not only affect the morphology of plants but also alter the physiology. Reduction in various parameters of the two plant species studied from polluted sites clearly indicate the deleterious effect of air pollution on plant health. It is evident from the present study that the air pollutants such as SPM , SO_2 , NO_2 and O_3 from automobile exhaust and industries along with many other unknown pollutants are responsible for bad air quality and are responsible for altering the epidermal structures in both *Tridax* and *Echinochloa* plants growing in polluted zones.

Date of Submission: 03-08-2019

Date of acceptance: 19-08-2019

1. Introduction

Continuously increasing vehicular pollution in the major cities of the world has led to serious environmental problems. Air pollution is now almost inescapable component of urban life affecting both plants and animals equally. The major pollutants are nitrogen oxides, carbon monoxide, carbon dioxide, sulphur oxides, volatile organic compounds and suspended particulate matter which contribute to 90% of air pollution. Apart from these small amounts of metals such as Cd, Cu, Hg and Zn have been discovered (Nasir and Nasir, 2015).

60-70% of the pollution found in an urban environment is on account Motor vehicles (Singh, et al., 1995; Tripathi and M. Gautam 2007; Desvechi and B. D. Tripathi 2008). Maximum pollution load in the major metros of India, is contributed by two wheeler alone (Central Pollution Control Board, 2002).

Plants act as good indicators of air pollution. They play significant role in assimilation and accumulation of polluted conditions. Plants develop different morphological, physiological and anatomical changes (Tran and Chaudhuri, 1984; Iqbal, 1985; Gupta and Ghosh, 1988; Cravener et al., 2003; Navak et al., 2003). Plants regulate the entry of gaseous molecules through stomatal movements. Injury to the plants by pollutants depends on the amount of pollutants entering the cells and their interaction with cellular constituents. Responses of plants to gaseous pollutants vary from species to species. Chronic exposure of leaves to pollution can break down the waxy cuticle leading to excessive loss of water and also interfere with photosynthesis and growth. Adverse effects of air pollution on plants have been studied by various workers (Kaur, 2004; Datta, 2006; Rai and Kishore, 2006; Shrivastava, 2006).

In the present investigation the influence of vehicular pollution on *Tridax procumbens* and *Echinochloa crusgalli* species was studied to understand their adaptive response to it. These plants were selected as they were found growing in the polluted sites.

Tridax procumbens, a member of Asteraceae is best known as a widespread weed in fields, meadows, croplands, disturbed areas, lawns, and roadsides in areas with tropical or semi-tropical climates. *Echinochloa crusgalli* member of Poaceae is a perennial herb. Both the plants have medicinal importance.

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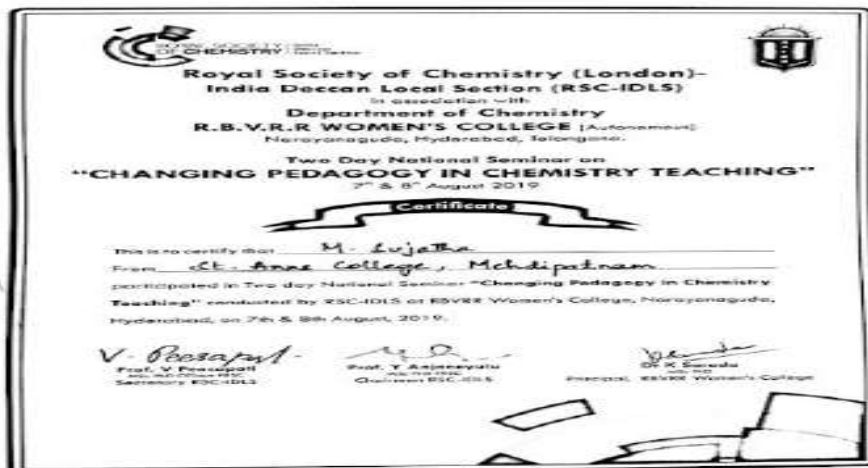
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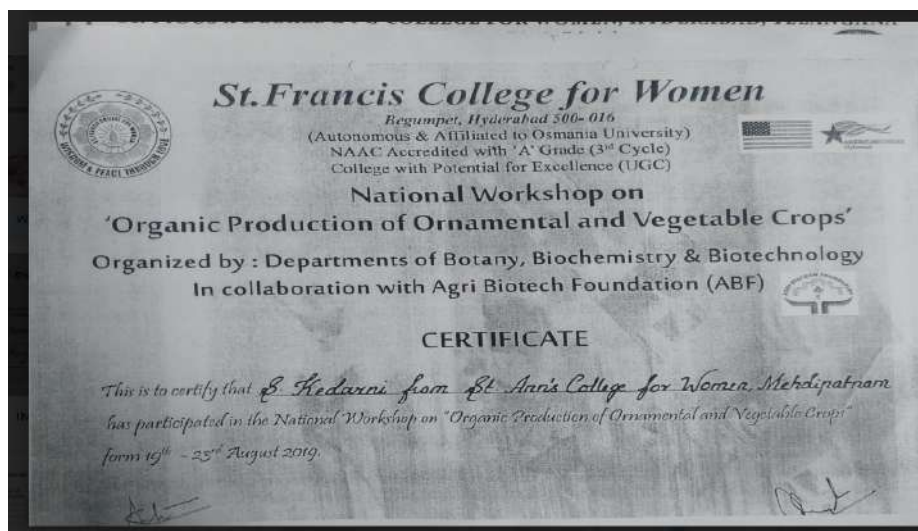
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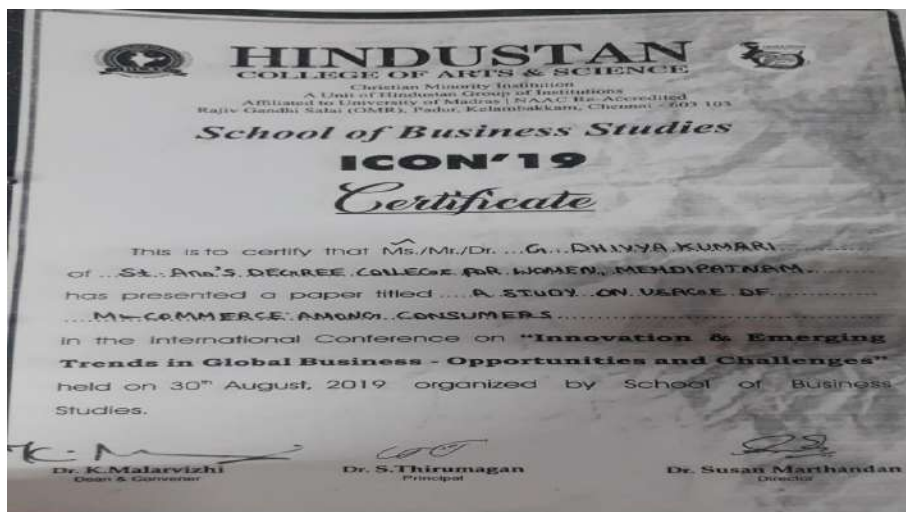
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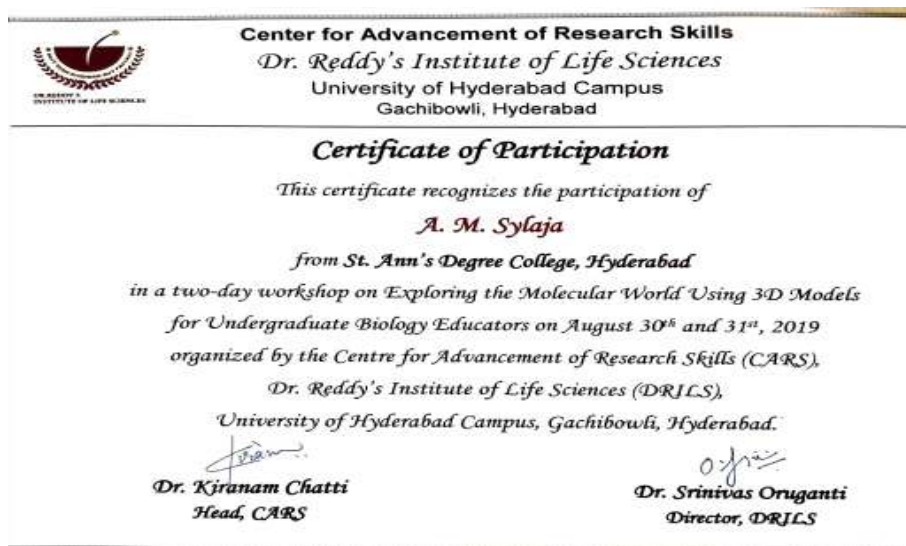
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20. Mrs. AM Sylaja





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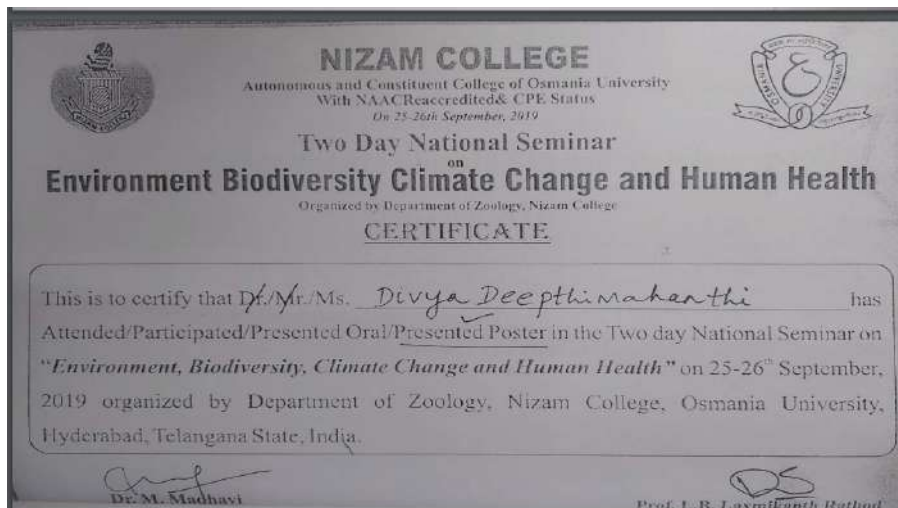
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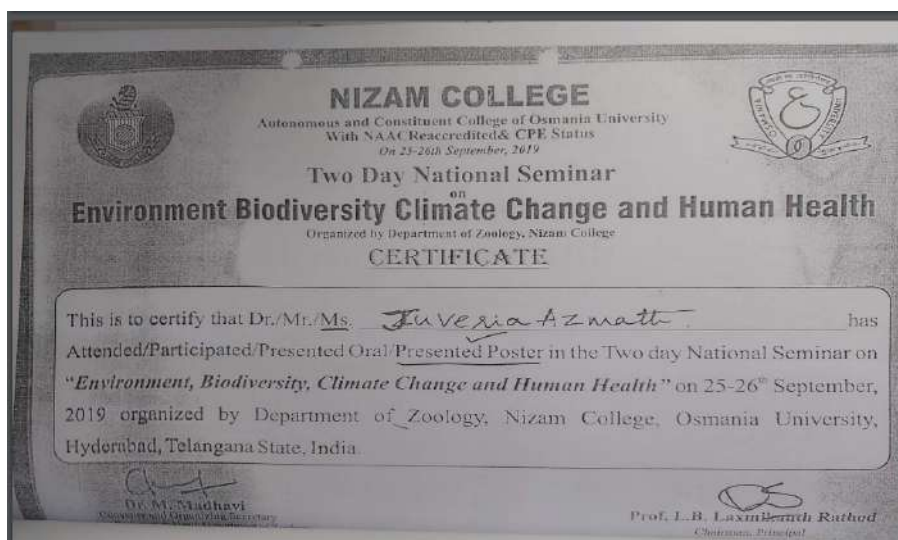
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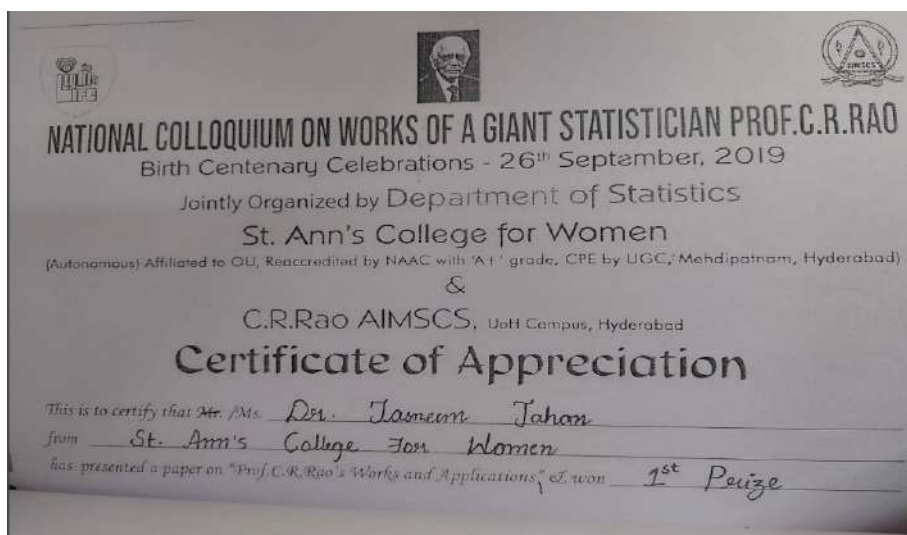
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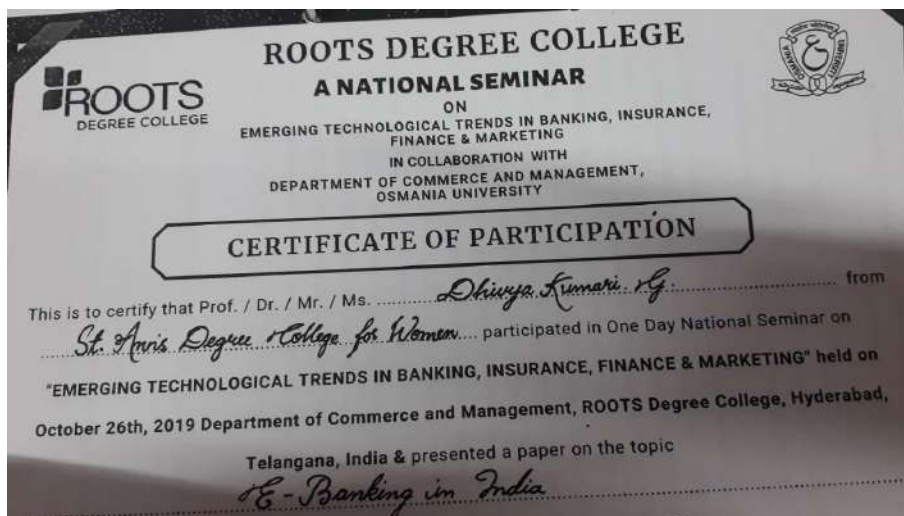
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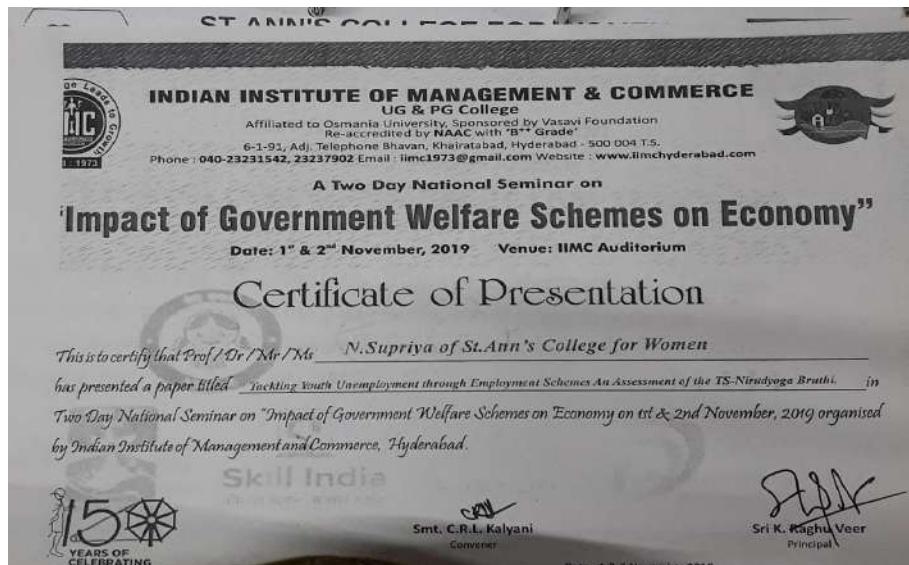
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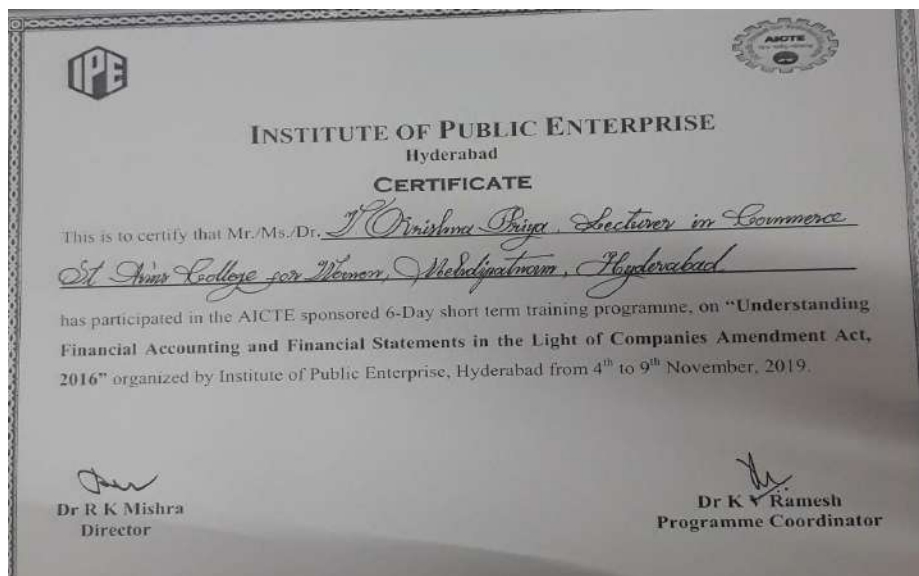
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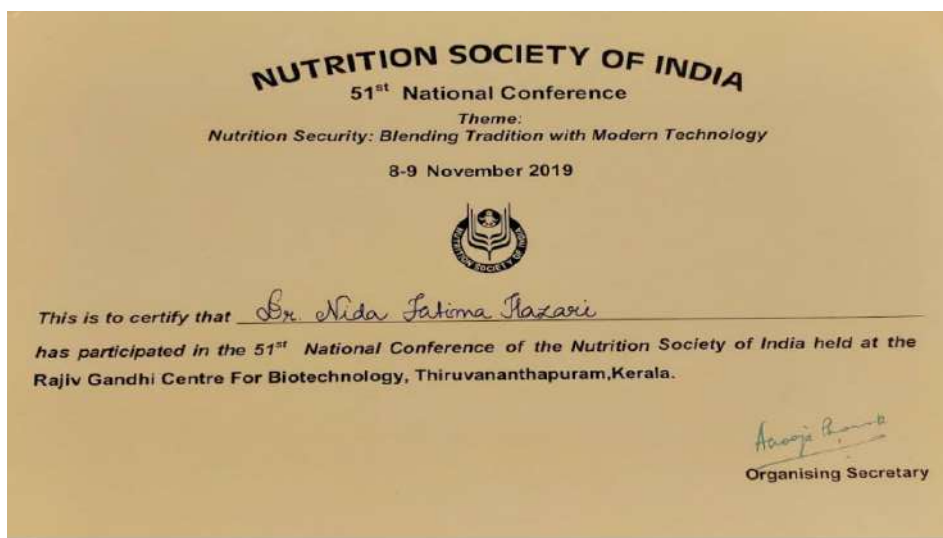
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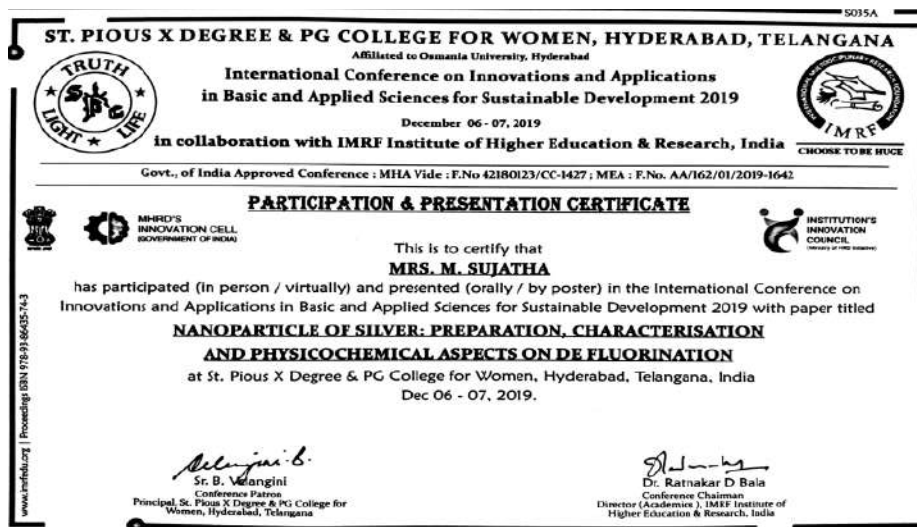
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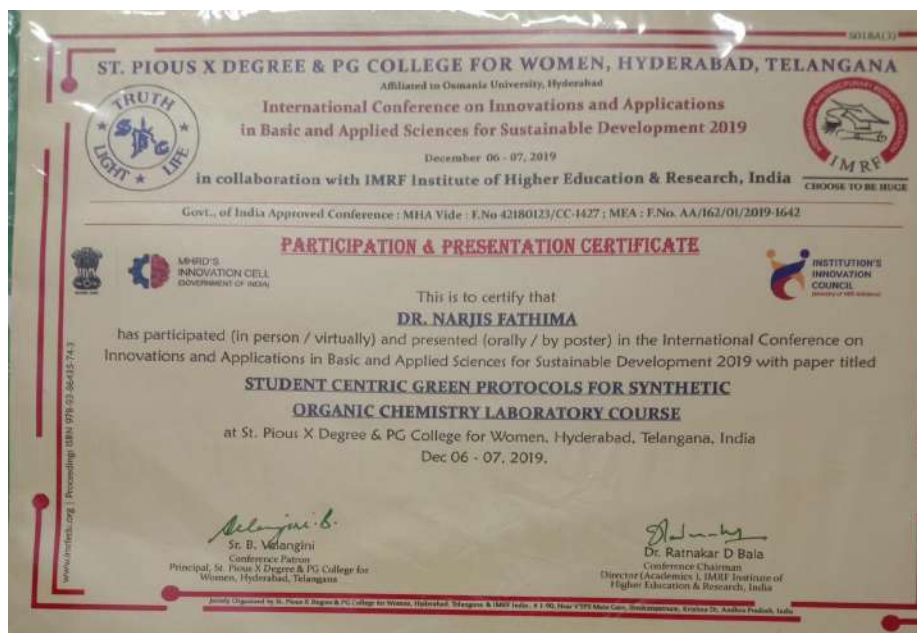
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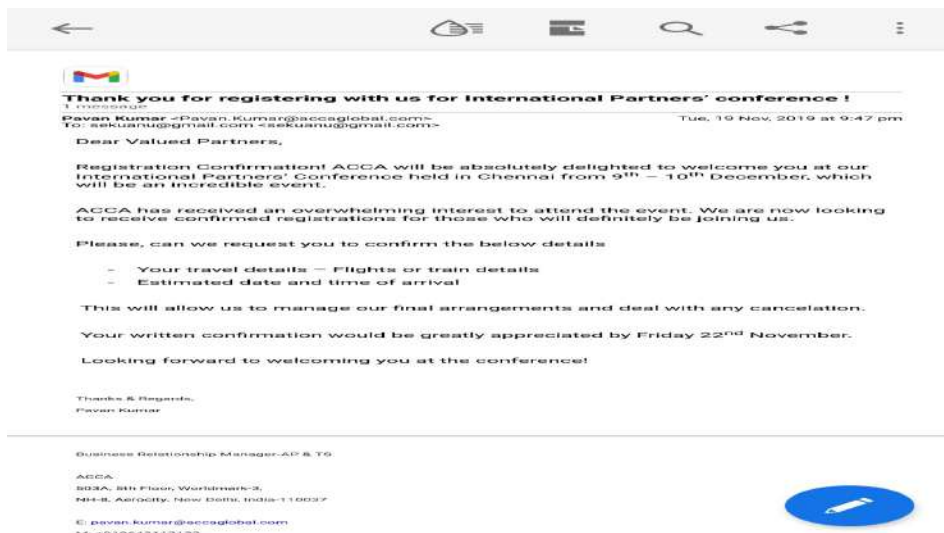
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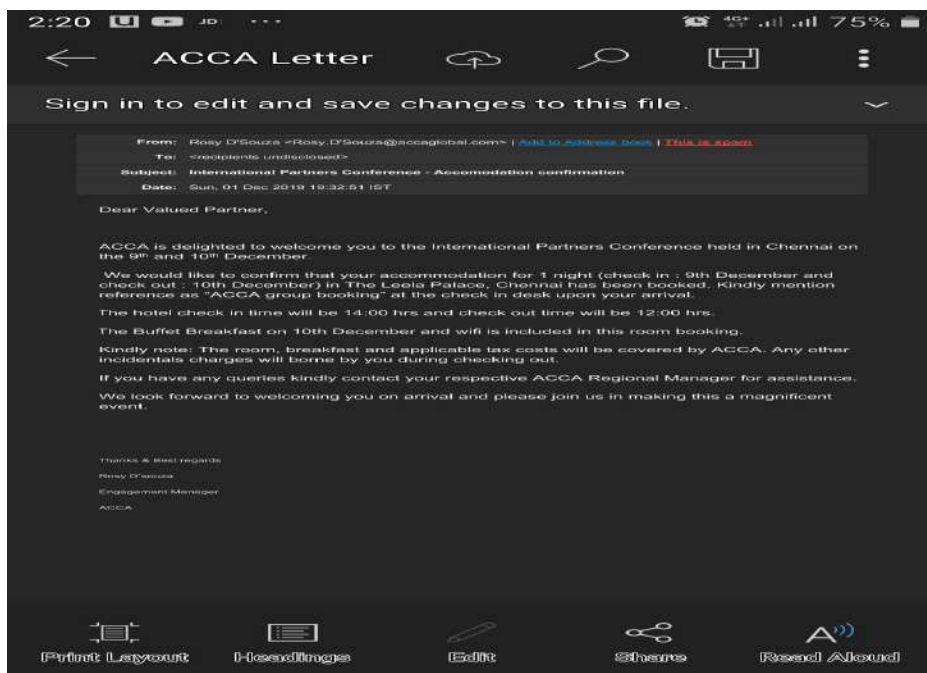
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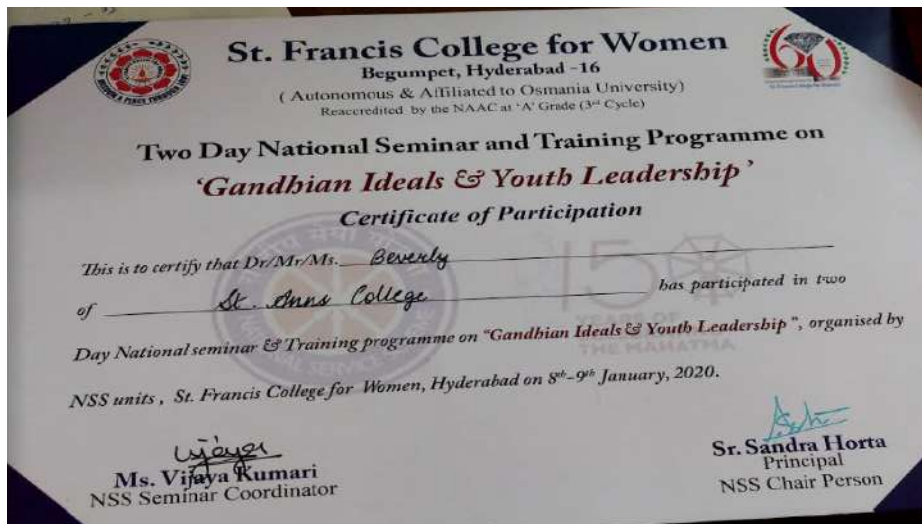
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