



Ms. Komal Rajendra Pimpalghare
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Research experience: Currently working as JRF under Central Mine Planning and Design Institute of India (CMPDI) entitled “Possible implications of bio-available iron in coal mine dust on coal workers’ lung disease” from June 2016 to till date.

Technical Proficiency: Standardization of cell line model (A549) and developed multicytokine ELISA assay for the study of immune regulatory response in animals exposed to dust and in cell line model (A549) induced with coal. Maintenance and culturing of U937 cell line. Standardization and analysis of cytotoxicity profile in different coal samples exposure to cells and development of different protocol for exposure of coal sample in cell line model.

Previously worked on CSIR project entitled “Novel method of in-vitro production of polyclonal antibodies: An alternative to animal experiments” as project fellow.

Technical Proficiency: In-vitro polyclonal antibody was produced using goat peripheral blood mononuclear cells (PBMC). PBMC separation was performed using density gradient Ficoll Histopaque method followed by cell viability using Trypan Blue Assay and cell count by hemocytometer. Cells were cultured on cell culture plate and induced using whole antigens, synthetic peptides. Antibodies were preserved using Lyophilization. Affinity chromatography: IgG purification of *in-vitro* produced antibodies. Standardization and Evaluation of *in-vitro* produced pAb by ELISA.

Other technical proficiency: Expertise in animal cell culture, maintenance of secondary cancerous cell line like MCF-7, HeLa, 3T3-L1 and etc, ELISA (Indirect and direct) and Proteomics (1D electrophoresis).

Also currently working as a coordinator in outsourcing wing along with Research lab services like certificate training courses and dissertation. Apart from that I have attended various workshops and seminar on nation level.