Tea is the most widely used beverage worldwide and occupies a prime position as a favourite beverage in oriental countries as Japan, India and China. A fact often overlooked is that tea provides direct employment to about more than one million people, and unlike other agricultural crops, tea provides the highest employment per unit of arable land. It provides the largest quantum of jobs to rural people, people in weaker sections of society and women.

The tea-plucking job is absolutely done by manually. The pluckers are to stay at tea garden almost 8 hours a day. Physical workload varies from time to time, but the overall physical load ultimately increased at the end of the day due to the working posture and increasing load on their backpack. Quantifying working posture and relating variations in posture to the physical demands of a task has long been an area of interest in the field of ergonomics, particularly in the field of tea industry.

Low back disorders (LBDs) represent the most common and most costly musculoskeletal disorder experienced in the workplace. Much of this LBD is associated with occupational factors. The starting point of an ergonomics intervention, to reduce the risk of musculoskeletal disorders, should always be to strive for a redesign of the workplace. In a modern industry, we all know, knowledge of ergonomics plays an immense role in redesigning and to suggest remedies for such physical discomfort. However, management is also concerned with the cost of ergonomics intervention. Human factors specialists therefore have to justify ergonomics improvements in the workplace, not just in terms of improved posture and comfort but also in terms of improvements in performance.

Tea industry management although readily perceives a direct linkage between the nutrition and productivity of the tea bushes, but, they exhibit a relative lack of appreciation of the input-output relationship in respect of the industry’s major asset – labour. As a result, they often can not appreciate the issue that there is a convergence between the health and welfare of workers and the interests of management. Good governance knows that better health leads to higher labour productivity, which in turn justifies viewing health and welfare outlays as investment rather than consumption expenditure.
Development of modern automated machines in industries has considerably decreased the physical burden of work on workers in addition to increasing the productivity of the industrial enterprises. But one of the most undesirable and unavoidable by-product of these operations and machines is noise pollution. Like many other industrial workers, tea processing factory workers are also exposed to high noise levels because of their machine-based occupation. It is also well known that most of the skilled and unskilled workers employed in the industries are either illiterate or semi literate, having no information about the noise regulations and adverse effects of noise on their performance and health. Unfortunate though, being mostly economically underprivileged and anxious to retain their jobs, majority of the workers accept adverse working conditions and do not demand health and safety measures.

Against such background information, this study was undertaken to examine the interrelationship between posture, comfort and productivity of tea pluckers; and also to examine the influence of various on-field and off-field dependent variables on their performance. The present study also was aimed to examine the effect of noise on different physiological parameters of factory workers of a tea processing unit.