Dual axis solar tracking system

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Declaration

We have made very large efforts to present our final year project.We have made these efforts because we did not want contribution of anyone else which is not part of our group or any other sources, on the basis of our studies, our researches and communications. We have done all of our work and assessment under the guidance of our project advisor Sir Jameel Ahmed at University of Management and Technology.

Signed: _____

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Date: _____

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Acknowledgement

Firstly, we would like to say thankful to ALLAH ALMIGHTY for making me capable for completing our final year project.

2nd we should want to say thanks to our advisor of final year project, Sir Jameel Ahmed to be greater counselor. He has led by an ordered way and helps us in the entire project. He have gave us several inspiration and solve our various issues. We are also very thank full to Sir Jameel Ahmad, our project director for improvement of our final year project. He guide and support us throughout our final year project. We should like to thanks Sir Awais Saeed for helping us throughout our final year project.

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Abstract

We get 17*1020unit of power through solar rays yearly. That is 2000 time larger then necessities of human being are onto ground. However we aren't using th0se possessions of solar rays suitably. As a result we face difficulty of lack of poweron globe. Wehave used those possessions to used solar rays and renovate it into electric power for getting more energy.

Most of solar plates in world are established. That's why they cannot travel within progressof sun and they cannot came at the angel of 90 degreeto sun everytime. As a result we cannot achieve most rays of light from sun.

Outputenergy created via higher application of sun light and photovoltaic system is straightforwardly associated to sum of sun rays power required by systemsand it's thus essential to follow sun location within largerdegree of exactness.

To solve problemwehave apply sun trackers that travel with move ment of sun. When sun move our plates might move with angel of 90 degre to Sun. So solar plates will got greatest rays through solar rays.

So as a consequence we could achieve highest rays through sun and changes it into electricalpower. Thus we c0uld solve issue of loss of power onto earth.

Literature review

Solar power system have emerge as a feasible resource of renewable power from last twenty to thirty years and now are extensively using for diversity of industrialized and household apps. These system are based on sun antenna, considered to accumulate solar power and alter it into both electrical energy and thermal power. Literature consisted of more researchesconcerning using of sun collectors for implementing these apps like light equipment, windowpane layersystem, cookers, and so on. Generally , energy developing in these apps depending primarily on total of sun power collected from collectors , and so issue of developed track scheme accomplished of subsequent route of sun throughout way of day on a year rounded bases have acknowledged considerable covering in literatures.

As for example many methods has been planned to optimize gradient angel and direction of sun collector considered for diverse geological lati tudes and probable exploitation period. Generally , result exposed through used precise model which is optimizing tilt angel and direction of sun collectors , annually achieve of greater than 5 percent can obtain in capture sun rays as comparing to case by which collectors are predetermined.

Our solar panel moves in dual axis solar tracker in dual x axis and y axis for getting greatest rays of light. As our solar plates moving with move ment of solar light than it remain at angel of 90 degrees to sun , thus it achievegreatest by the sun every time. It eliminate issue of fix solar system solar panel which c0uld not move with sun movements , which results in not getting max. Solar power through sun.

Introduction:

Energy emergency is one of the most serious issues in creating nations. There isa major hole amongst age and request of Electric energy. Since the stores of Non-sustainable power source are constrained, the main arrangement is to utilize Renewable energy. Sunlight based energy which is available in plenitude can assume a fundamental part to beat the energy insufficiency. The capability of sun based voltaic energy can likewise be abused for turning away natural contamination and overseeing climatic emanation.