REPORT ON SUMMER PROJECT

Path Finding Visualizer

Under the platform
"Coursera"

Submitted By
RAHUL
KUMAR[19103350]

SCHOOL OF STUDIES, ENGINEERING & TECHNOLOGY
GURU GHASIDAS VISHWAVIDYALAYA
BILASPUR, C.G., INDIA

CERTIFICATE

UNIVERSITY OF MICHIGAN

08/10/2022

Rahul Kumar

has successfully completed

Introduction to Web Development with HTML,CSS,Javascript

an online non-credit course authorized by University of Michigan and offered through Coursera

Colleen van Lent

Colleen van Lent, Ph.D.
Lecturer
School of Information, University of Michigan

Charles Severance
Clinical Professor, School of Information
University of Michigan

Verify at coursera.org/verify/YGF8GLH67ST3
Coursera has confirmed the identity of this individual and
their participation in the course.

INTRODUCTION

Visualization is an efficient way of learning any concept faster than conventional methods. Modern technology allows creating e-Learning tools that also helps in improving computer science education very much. The goal of this project is to create a web based e-Learning tool, 'PathFinding Visualizer', which can be used to visualize shortest path algorithms. The conceptual application of the project is illustrated by implementation of algorithms like Dijkstra's , A* and DFS.

The end product is a web application so that any user can easily see and learn the working of the algorithms.

At its core, a pathfinding algorithm seeks to find the shortest path between two points. This application visualizes various pathfinding algorithms in action, and more!

These algorithms are used to identify optimal routes through a graph

for uses such as ip routing and gaming simulation.