Transportation is movement of people construction essay

Transportation projectIntroductionTransportation is the movement of people or goods from one location to other location. Transportation is one of the important fact in world. Mode of transportation include air , rail, road , water, cable , pipeline and space. The Transportation field can be divided into infrastructure, vehicle and operations. Transport consists of the fixed installations essential for transport, including roads, railways, airways, waterways, canals and pipelines and terminals such as bus stations, warehouses, airports, railway stations, trucking terminals, refueling depots, and seaports. Terminals may be used both for exchange of passengers and cargo and for maintenance. Vehicles traveling on these transportation networks may include automobiles, bicycles, buses, trains, trucks, people, helicopters, and aircraft. In the transport industry, operations and ownership either public or private, depending on the country and mode.

General Transportation

General transportations mode include air, rail, road and water, pipeline transport, cable transport.

Road Transportation

A road is an certain route, way or path between two or more places. Roads are typically smoothed, or otherwise prepared to allow easy travel though they need not be, and historically many roads were simply familiar routes without any formal construction or maintenance. In urban areas, roads may pass through a city or village and be named as streets, serving a dual function as urban space easement and route. The most common road vehicle is the automobile; a wheeled passenger vehicle that carries its own motor. Other users of roads include buses, trucks, motorcycles, bicycles and

pedestrians.. Automobiles offer high flexibility and with low capacity, but are deemed with high energy and area use, and the main source of noise and air pollution in cities; buses allow for more efficient travel at the cost of reduced flexibility. Road transport by truck is often the initial and final stage of goods transport.

Rail

Rail transport is where a train runs along a set of two parallel steel rails, known as a railroad or railway. The rails and perpendicular beams are placed on a foundation made of concrete or compressed earth. Alternative methods include maglev and monorail. A train consists of one or more connected vehicles that run on the rails. The locomotive can be powered by steam, diesel or by electricity supplied by trackside systems. on the other hand, some or all the cars can be powered, known as a multiple unit. Also, a train can be powered by horses, pneumatics cables, gravity and gas turbines. Railed vehicles move with much less friction than rubber tires on paved roads, making trains more energy efficient, though not as efficient as ships. Intercity trains are long-haul services connecting cities modern high-speed rail is capable of speeds up to 350 km/h (220 mph), but this requires specially built track. Regional and commuter trains feed cities from suburbs and surrounding areas, while intra-urban transport is performed by high-capacity tramways and rapid transits, often making up the backbone of a city's public transport.

Air

Air transportation is commonly used for passenger’s transportation and cargo service. A fixed-wing aircraft, commonly called airplane, is a heavier-

than-air craft where movement of the air in relation to the wings is used to generate lift. A gyroplane is both fixed-wing and rotary-wing. Fixed-wing aircraft range from small trainers and recreational aircraft to large airliners and military cargo aircraft. The aircraft is the second fastest method of transport, after the rocket. Commercial jets can reach up to 955 kilometers per hour (593 mph), single-engine aircraft 555 kilometers per hour (345 mph). Aviation is able to quickly transport people and limited amounts of cargo over longer distances, but incur high costs and energy use; for short distances or in inaccessible places helicopters can be used. Two things necessary for aircraft are air flow over the wings for lift and an area for landing. The majority of aircraft also need an airport with the infrastructure to receive maintenance, restocking, refueling and for the loading and unloading of crew, cargo and passengers. While the vast majority of aircraft land and take off on land, some are capable of takeoff and landing on ice, snow and calm water.

Water

Water transport is the process of transport a watercraft, such as a boat, ship, barge, or sailboat, makes over a body of water, such as a sea, ocean, lake, canal or river. The need for buoyancy unites watercraft, and makes the hull a dominant aspect of its construction, maintenance and appearance. In the 19th century the first steam ships were developed, using a steam engine to drive a paddle wheel or propeller to move the ship. The steam was produced in a boiler using wood or coal and fed through a steam external combustion engine. Now most ships have an internal combustion engine using a slightly refined type of petroleum called bunker fuel. Some ships, such as

submarines, use nuclear power to produce the steam. Recreational or educational craft still use wind power, while some smaller craft use internal combustion engines to drive one or more propellers, or in the case of jet boats, an inboard water jet. In shallow draft areas, hovercraft are propelled by large pusher-prop fans

Pipeline transport

Pipeline transport sends goods through a pipe, most commonly gases and liquid are sent, but pneumatic tubes can also send solid capsules using compressed air. For gases, liquids any chemically stable liquid or gas can be sent through a pipeline. Short-distance systems exist for sewage, slurry, water and beer, while long-distance networks are used for petroleum and natural gas.

Cable transport

Cable transport is a broad mode where vehicles are pulled by cables instead of an internal power source. It is most commonly used at steep gradient. Typical solutions include aerial tramway, elevators, escalator and ski lifts; some of these are also categorized as conveyor transport.

STMP (service transportation Master plan).

Abu Dhabi 2030 transportation.

Abu Dhabi is enhancing their transportation day to day for improving their service. They want to become a world top transportation provider in this world. Now they have bus , taxi , flight , ship etc. For metro railway they have started their project with name as ethihad railway project. In bus they have punching card system forPaying money. It will help to passenger to

reduce their difficultly. In bus they are providing long and rural area root service with low fare. In long root bus they have free internet wife facility and food supply service with cabin crew. All the buses include centralized air condition. And also contain camera system to monitor front and rear and also inside the passenger monitoring system. For guiding the passengers, speaker and mic facility also available in bus.

Taxi service

Abu dhabi government providing good taxi service. They are providing luxury car as taxi for passengers with affordable fare. All the cabs are monitoring by centralized gps system. Based up on the distance traveling, automated machine are calculating the payment. Apart from this they are providing cabs service for ladies separately for secure. All the taxi drivers are well trained drivers and they are getting frequently training for how to behave and treat for passengers.

Why are we improving transportation

Nowadays the amount of traffic has increased rapidly, which leads to big traffic jams every day. There are two main solutions: improving roads, highways and improving public transportation. There have been many debates about which solution we should focus on. In my opinion, upgrading the public transportation system brings more advantages. First, let's analyze why improving roads and highways is not a good option. As we all know, the number of cars has rose tremendously in the last few decades. Building roads do not solve the puzzle about traffic jams but encourage more and more people use their own cars instead of buses, subways. Moreover, it is very expensive to invest in roads and highways projects, and these projects

often bring no good results. When roads or highways are being repaired, construction companies have to close them and people have to use other streets. This can cause a street to be overcrowded with cars; therefore, a lot of people will be stuck in traffic jams. An American wastes about one week each year in traffic jams. Traffic jams make the economy lose a lot of money each year. Cars in traffic jams cannot move, but they continue to emit harmful smoke to the air, which will make the global warming issue more severe. Another reason why upgrading public transit service is preferable is that it alleviates the environmental issues. If we have good public transportation, more and more people will use buses, subways instead of using cars. The amount of traffic will decrease; therefore, there will be less harmful smoke, the main cause of air pollution and global warming, in the air. Furthermore, we have to know that governments work for the people. Many people in the middle and lower class, who account for large portions in population, use public transportation because the cost is cheap. If we build more roads, only people in the upper class can be beneficial from this. A good government is a government that serves all people, not only a small group of wealthy individuals. If all people use buses or subways, they will be more aware of the sense of community. Those are the reasons why I think governments should concentrate on improving public transportation. I use buses as much as I can. If we all use buses or subways, this world will be a better world.

it improve human productivity in work with less nervous mind due to no traffic and soft transportation

Traffic reports tell you where there are accidents, long lines, bad sections of road, detours and other situations that you might want to avoid. If you know in advance, you can take an alternate route. It pays to listen, especially during rush hour. Transport is not the only source of pollution –but it is an important one – and the only sector where growth in demand threatens to outpace technical improvement. Research and experience proves we cannot improve the environment by expanding road capacity to keep pace with traffic growth. Air quality (and congestion, and economic efficiency) requires reduction in traffic.

clean healthy city with a low carbon used

Greater use of clean technologies and electric cars will drastically reduce air pollution in European cities. Fewer people would suffer from asthma and other respiratory diseases; considerably less money would need to be spent on health care and on equipment to control air pollution. By 2050, the EU could save up to €88 billion a year in these areas. The transition to a low-carbon society would boost Europe's economy thanks to increased innovation and investment in clean technologies and low- or zero-carbon energy. A low-carbon economy would have a much greater need for renewable sources of energy, energy-efficient building materials, hybrid and electric cars, 'smart grid' equipment, low-carbon power generation and carbon capture and storage technologies. Efficient land use produces results far beyond the immediate benefit of increased use of public transport. It has the potential to significantly change the way we live and travel, reducing our

individual carbon footprints while preserving and enhancing our mobility. Higher densities allow for closer proximity of housing, employment and retail, reducing driving distances and enabling communities to plan for and support alternative travel options. In many central business districts, trips taken for shopping, dining or other non-commuting purposes are often made on foot — even by those who drive to work. Higher density development, multi-use buildings, and compact apartments and office space — is more energy efficient and extends public transport’s contribution by integrating it with other sectors of our economy. Public transport with its overarching effects on land use, is estimated to reduce CO2 emissions by 37 million metric tons annually. This indirect " leverage effect" of public transport is estimated, conservatively, at three to four times the direct effect of transit service. With this leverage effect, transit is estimated to reduce CO2 emissions by 37 million metric tons annually. In addition, public transport reduces energy consumption by the equivalent of 4. 2 billion gallons of gasoline each year, the equivalent of 320 million cars filling up — almost 900, 000 times a day in the USA. To make the transition the EU would need to invest an additional €270 billion or 1. 5% of its GDP annually, on average, over the next four decades. The extra investment would take Europe back to the investment levels seen before the economic crisis, and would spur growth within a wide range of manufacturing sectors and environmental services.

use of public transportation and reducing from using private cars

Those who choose to ride public transportation reduce their carbon footprint and conserve energy by eliminating travel that would have otherwise been made in a private vehicle. The result is fewer vehicle miles of travel and reduced emissions.

Public transportation use reduces congestion

Public transportation serves some of the most congested travel corridors and regions in the country. Increased use of public transportation in these areas eases congestion; as a result, automobiles traveling in these same corridors achieve greater fuel efficiency

Public transportation use is one of the most effective actions individuals can take.

Public transportation offers an immediate alternative for individuals seeking to reduce their energy use and carbon footprints. This action far exceeds the benefits of other energy saving household activities, such as using energy efficient light bulbs or adjusting thermostats.

Public transportation gives people energy efficient choices.

Public transportation reduces overall greenhouse gas emissions without reducing the mobility so vital to our nation’s economic health and our citizens’ quality of life. The increasing cost of fuel makes driving private vehicles even more prohibitive for many. Public transportation households save an average of $6, 251 every year3—even more as the price of fuel rises.

Public transportation is essential to energy efficient land use patterns.

Efficient land use produces results far beyond the immediate benefit of increased use of public transportation. It has the potential to significantly change the way we live and travel, reducing our individual carbon footprints while preserving and enhancing our mobility.

Protect and preserve public transportation service where it exists today.

Public transportation ridership has increased by 30% since 1995—a growth rate more than twice that of population, and greater than vehicle miles of travel. As transit ridership has increased, a number of systems are struggling to maintain the quality of assets and consequently the quality and reliability of service. Systems must be adequately funded to allow people who are choosing public transportation, more than 10 billion trips annually, to stay on public transportation.

Expand capacity of existing public transportation services.

In many parts of the country, public transportation systems are operating beyond their design capacity. With future annual ridership growth projected at 3. 5% annually, it will be difficult for a number of these systems to carry additional riders without significant new investment.

Why are we choosing Bus ?

Lot of passenger can travel at a time via bus. And it is more comfortable and more specious . Bus service will provide a proper route service daily with proper timeSo the passenger can reliable this service to travel from one

location to another location . Comprehensive maps with all bus routes and their timings are provided on Ojra website. The buses stop at the main stations designated to each route, as well as at every lay-by between the main stops, should passengers wish to board or disembark.

Benefits:

Low costSpaciousComfortableReliable serviceProper time serviceCan accommodate more people

What is the special about using Bus ?

We can travel Low cost in bus. Compare to other transportation , bus service transportation providing low cost . That will help to passenger to travel anywhere with low cost. Bus have more Spacious than other vehicle and accommodate more passengers or things to carry one place to another place. It have more seating capacity than other vehicle . The well established seating and centralized ac and food supply service with cabin crew and front and rear side monitoring camera system. Bus has proper timing and day to day service from one place to another place. So passenger can wait the specified time to travel from one place to another place. Public transportation improves the quality of life in communities across the country by providing safe, efficient and economical service. It also serves as a vital component necessary for a healthy economy. Not only does public transit benefit the people who use it, it also benefits society as a whole. Public transportation fosters transit orientated development that provides convenient access to public transportation and integration of transit in the community. Public transportation encourages land-use programs that generate synergies and create a range of housing types, from single-family

homes to apartments, to accommodate diverse incomes and family structures. Public transportation revitalizes neighborhoods, increases social interaction and pedestrian activity, enhances safety, and helps create a sense of " place" that will help make a community unique and special. Public transportation generates a financial return for communities and businesses as well as individual and collective savings that can be captured and invested in housing or amenities rather than transportation, parking and auto-orientated infrastructure. When commuters ride public transportation or walk, contact with neighbors tends to increase, ultimately helping to bring a community together

What are the services that the Bus could provide ?

The buses are an excellent way to get round the city and are excellent value for money. Routes start at about 6: 30 am and finish around midnight. The buses are popular with all nationalities. The section for women is immediately behind the driver and men at the back. They can be crowded at peak times. Bus Rapid Transit is implementation of a comprehensive set of public transport priority measures on a specific corridor or route. In other words all the specific topics covered in this best practices wiki are combined and used on a particular bus or streetcar route. Therefore the difference between BRT and public transpoBus Rapid Transit systems closely replicate the features offered by rail transit including: Separate right of way from private vehiclesHigh quality stations with real time service information, off-board ticket vending and perhaps retail facilitiesDistinctive, quiet and easily accessible modern multi-door vehiclesPriority signaling at intersectionsSince BRT systems consist of less and less complex infrastructure, they can often

be built for a fraction of the cost of rail transport systems and can be implemented quickly. As one of the recommendations in the recently completed EU study PROCEED put it, public transport agencies should " Think tram, use bus" in their planning process. The key benefit of BRT is that it enables public transport operators to provide a very high level of service with lower investment costs than building a rail-based public transport line (e. g light rail). While rail-based public transit can generally carry higher numbers of passengers and many consider rail based transport more comfortable and attractive than buses, modern BRT systems like Bogata's carry more people than many light rail systems and modern buses are far more comfortable than older ones. The important point is not to get caught-up in an argument between which mode (BRT or light rail?) is best, but to understand the advantages and disadvantages of both modes and implement the mode that makes the most sense in a given situation. When considering a BRT system it's important to understand that while BRT systems have generally lower investment costs than rail systems, very high capacity BRT systems and BRT systems that build separated guideways (e. g. tunnels or elevated fly-overs) are also expensive - less than light rail, but close enough so that it's important to fully consider the trade-offs between modes when making planning decisions. The real advantage of BRT over rail systems is the ability of buses to operate on regular streets. This means that major investments like grade separations made on a specific section of the corridor/route can be used by many different bus routes. The best examples are feeder buses that circulate through low density neighborhoods and then enter the BRT corridor for a fast trip to the center city (e. g. a center city bus tunnel). In this case many different bus routes can use the same BRT facility.

This improves passenger service by eliminating a transfer between local feeder service and the high speed service (which would be required, for example, with a light rail system). rt priority is mainly a question of how many measures and improvements are implemented. Introduced on 30th June 2008, there is a network of airconditioned buses operated by the Department of Transport that cross the island of of Abu Dhabi including: Grand (Sheikh Zayed) Mosque, Abu Dhabi Mall, Marina Mall, Al Wahda Mall, Al Mina Shopping Centre, Khalidya Mall, Bain Al Jessrain (Souk at Qaryat Al Beri and Shangri-La Hotel) and Carrefour (on Street 2, aka Airport Rd). The buses around the city are priced at 1 AED per trip (or buy a one day pass for 3 AED or a monthly pass for 40 AED). Clear bus maps are found at all bus stops. The number of routes can be expected to increase in future, to include the International Airport, Mussafah and Khalifa City which are currently outside the bus network.

What are we achieving from using Bus?

Introduced on 30th June 2008, there is a network of airconditioned buses operated by the Department of Transport that cross the island of of Abu Dhabi including: Grand (Sheikh Zayed) Mosque, Abu Dhabi Mall, Marina Mall, Al Wahda Mall, Al Mina Shopping Centre, Khalidya Mall, Bain Al Jessrain (Souk at Qaryat Al Beri and Shangri-La Hotel) and Carrefour (on Street 2, aka Airport Rd). The buses around the city are priced at 1 AED per trip (or buy a one day pass for 3 AED or a monthly pass for 40 AED). Clear bus maps are found at all bus stops. The number of routes can be expected to increase in future, to include the International Airport, Mussafah and Khalifa City which are currently outside the bus network. The buses are an excellent way to get

round the city and are excellent value for money. Routes start at about 6: 30 am and finish around midnight. The buses are popular with all nationalities. The section for women is immediately behind the driver and men at the back. They can be crowded at peak times.

What are the possible soluations to be done for transportation for now before 2030 ?

Provide high class facility serviceCategorize the facility depends up on the passengers choiceMake it centralized punching card systemImplement metro station important placeEnhance the metro service to connect all the emiratesImplement centralized control roomImplement Advance monitoring systemImprove customer supporting system IVRReduce the trafficSpeed control improvement

What can we make master plan for later in future ?

Planning for the futureThe Transportation Master Plan shows what our transportation network will look like in the future. It includes bicycle / pedestrian links and road building projects through 2030. Castle Rock’s current Transportation Master Plan was created in 2003 and revised slightly in 2004 and 2007. A major update to the plan is available below and was completed for several reasons: The Town’s population has increased by more than 60 percent since the 2003 plan was createdThe recent economic downturn has made it necessary to revise population and employment forecasts used in the previous planMany of the projects identified in the 2003 Transportation Master Plan have been completedThe final NSW Long Term Transport Master Plan was released today by the Minister for Transport, Gladys Berejiklian and Minister for Roads and Ports, Duncan Gay. The Master

Plan sets a clear direction for transport in NSW for the next 20 years, bringing together all modes of transport, across all regions of the state into a world class, integrated network that puts the customer first. Additionally, the new plan will emphasize bicycle and hiker improvements in hopes of making the Town friendlier to those types of transportation.

- Provide train routes and maps is a MUST!!! (it can be available in Department of Transportation website)

Supported by tram and bus feeder services on around 131 KM, ‘ Abu Dhabi Metro’ rail system is intended to serve a substantial proportion of passenger trips and relieve traffic congestions on the highway network , as well as to provide best connectivity between Abu Dhabi Island and its suburbs and upcoming communities such as Saadiyat, Yas Islands and Al Raha Beach. The Surface Transport Master Plan (STMP), a major initiative taken by the Department of Transport (DoT) in Abu Dhabi to develop a comprehensive plan for surface transport – including different modes for passengers and freight such as roads, metro and Light Rail Transit (LRT) – indicated the need for establishing a high-quality, high-capacity metro rail system in Abu Dhabi as highlighted above. In response to the STMP’s indication, DoT is in the process of preparing a detailed study in management with leading international consultancies to ensure implementation of the ‘ Abu Dhabi Metro’ project in accordance with its schedule and technical specifications.

- Any more information about transportation and good ideas will be appreciated.

the determination of parameters of the metro line covering its alignment, track rail systems and station locations. the selection of the optimal project

urban insertion. the provision of capital, operation and maintenance cost estimates of the metro line. the project implementation schedule. the modification of alternative options for design, construction, procurement and operations. The specification of optimal functional / output characteristics of the project to maximize its patronage and financial viability.