1. Introduction

Problems of Existing System and Recommended Solutions

- Grunge hotel employees are Eastern Europeans, who are highly skilled in renovating properties, accept rates of pay below the market average and work very diligently. After the UK has opted out of the European Union, all European citizens without a U.K.passport will be forced to leave the country. That government changes has a detrimental effect on the hotel group. As a solution, the Grunge hotel group should target to school leavers as a good tradesperson to join their company with the hope that they will accept pay levels on a par to Eastern Europeans.

- The organization needs a fundamental I.T.systems. An information system is a combination of hardware, software, data, business processes and functions which can be used to increase efficiency and strategic, managerial and operational activities of an organization. Transaction processing system (TPS) and Management Information System) contain parts of main types of information systems. Transaction processing system enables routine transaction to be processed such as recording bookings,

generating reports, etc. Management information system takes internal resources of information form an organization's transaction processing systems are summarized into management reports for middle level management. In this Grunge Hotel Group, MIS can use to make market research, staff performance and budgeting. The hotel group should implement web base online system that runs inside a web browser over a network connection.

- The end of the year accounts are lower than the standard expected of a commercial company due to employing finance staff who have no appropriate qualifications in order to keep costs down. The hotel Group should employ qualified people to solve the problems of costs down.

- There is a substantial basement that is intended to be used for storing servers and other essential equipment for the I.T.systems. There is a chance of flood risk in which a marker in the basement sating how high the water reached in the heavy rains. So that the hotel group shouldn't store servers and other essential equipment at that basement.

- The managing director has ignored the comment form one employee that there is a marker in the basement sating how high the water reached in the heavy rains. The managing director needs to accept and respect all hotel group employees' opinions, visions and advices.

2. Strategic Evaluation

SWOT analysis

Strength

- Grunge hotel organization is cash rich and has been growth steadily.

- Dilapidated premises are changing into basic hotels.

- The hotel group offers basic accommodation with cheapest possible prices.

- The organization has good ratings on websites.

- The organization also gets recommendations from medical professionals.

- The employees of the Grunge hotel are highly skill in renovating properties and work very diligently. So that there is excellent customer relations and the hotel group promotes the good image.

- School leavers who have a chance to be a good tradesperson can join their company.

Weakness

- The organization needs a fundamental I.T.systems.

- The hotel booking can only be taken over the phone so that customers cannot be booking for every 24 hours.

- All hotel bookings are recorded manually so that there can have data missing and data duplication.

- All financial transactions are processed manually with accounts books kept up to date by clerks. Sometimes, a clerk can make wrong calculation of financial transaction.

- Clerks have to send the details of transactions to Head Office every day.

- The end of the year accounts are lower than the standard expected of a commercial company due to employing finance staff who have no appropriate qualifications in order to keep costs down.

- The managing director thought his costs will rise by such an extent an I.T.systems.

- To extend as an IT system, managing director needs to employ more people to stay at his hotels and also the costs will rise.

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Opportunities

- Government agencies and the police make a concerted action which is over 200 properties nationwide have been cleared of an anarchist group's members. These properties will be sold by auction. But many of these properties have been left in

appalling state. This is an opportunity that the organization can get many properties with very low prices.

- Rich resident Russian Oligarch has committed £500 million for unemployment as a free week's holiday. The hotel group aims to be a good quality hotel with suitable price.

- Government has decided to refocus schools away from academia and promote trades such as electricians, plumbers, builders, decorators etc. The hotel group can target those school leavers as good tradespersons.

Threats

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PEST Analysis

Political Factors

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Economic Factors

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Social Factors

- The organization has good ratings on websites.

- The organization gets recommendations from medical professionals.

- The hotel chain meets its target of being cheapest, as well as fostering the good image that the hotel chain enjoys.

Technological Factors

- Customers can make booking even from remote areas due to improvement in worldwide communications.

- The digital marketing technique is more benefits than the expensive advertising.

Impact of IS

3. Main functional elements that the Grunge Hotel Group needs

Information taken from a transaction processing system can be used by another information system. A management information system uses information such as hotel booking data , how many rooms are empty for one day, trends in booking and how many rooms are booked for one day, etc. and a management information system report is generated that details how many booking of the hotel have been achieved in a different region.

Customers

- Make registration and login

- Make hotel selection by region

- Search room types and make room type selection

- Make booking process

- Cancel booking

- View invoice

- Payment

- Edit customer detail

Staffs

- Make registration and login

- Fill Hotel detail information

- Room types registration

- View booking lists

- Check available rooms

- Confirmed booking

- Record booking details (duration, numbers of people, numbers of rooms)

- Produce invoice

As part of customers, the system will display available rooms with their associated hotels.

Customers can search all hotel information and available rooms either login or not.

Customers need to register with their details to make booking process. The system

requests to customers to select the hotel that is based by their region. And the system

will display the available rooms of the selected hotel. Then, customers can choose and

make the booking process. The system will automatically calculate the final cost based

on the numbers of rooms with associated dates. Customers can produce invoice and

make payment process via online. The system will also support multi languages for

different type of customers.

As part of staffs, they will make registration processes to enable login. And they can fill

information about the 43 hotels. They will register the types of rooms for each hotel.

And they can also check the booking lists. They will check that requested room is

already booked or not. If the requested room is available, they will reply to each

customer. Then, they will record the details of booking such as how many people will

stay at the hotel? How many rooms they will book? How long they will take for booking?

And then they need to produce invoice for payment process.

Reporting requirements of this system

Internal resources of information taken from transaction processing systems are

summarized into management reports for middle level management. All report will

produce by using database.

Monthly income report – This report will show the income of grunge hotel group in a

month. This is produced by the manager for the operational level.

Weekly booking rate report - This report will show the booking rate of grunge hotel

group in a week. This is produced by the manager for the operational level.

Monthly popular room type report - This report will show the most popular room type

of the hotel within a month. This is produced by the manager for the strategic level.

4.   Type of information required by managing director

Managing director considers the whole organization information associated with operational efficiency. MD must consider staffs performance by checking customers' feedback on staffs and find out who needs retraining, who needs sacking (!).

Compare and contrast the information needs of the hotel managers and managing Director

Manager needs to make a decision which may be based on experience and knowledge but could be better if it comes from data. Managers therefore have information requirements which can only come from data requirements being fulfilled. So that information about hotel is an important role to make decision. Every decision for grunge hotel group must be effective. The managing director will require summarized information but the manager will require detail information about the grunge hotel group. The manager director makes strategic decision while the hotel manager makes operational decision.

Managing director (MD)

-   MD needs external information associated with organization.

- MD needs to make improve market share of the hotel group.

- MD needs to measure the progress of each hotel.

- MD needs to make improve performance of each hotel.

- MD needs to consider what types of customers are stayed at the hotels.

- MD needs to review the monthly overall lost and profit of the organization.

Hotel managers

- Hotel managers need detail information of their associated hotel.

- Hotel managers review customer feedback on employee. (to find out who needs

retraining, who needs sacking)

- Hotel managers need to measure the performance of employee.

- Hotel managers need to consider what type of rooms are mostly stay by customers.

- Hotel managers need to know daily income and outcome of their associated hotel.

5.

Biggest organizational changes

By implementing a new system, the organization will face changes and difficulties:

- The organization implements a fundamental I.T.systems. In existing system, all the

hotels operate individually, manually recording booking(which can only be take over

the phone), all financial transactions are processes manually with accounts books.

- The organization structures and procedures will change.

- The redeployment of staffs between the organization and staffs will require training

because of using the computerized system.

- The organization will make re-organization and recruitment.

- There are also changes in user operating procedures. So, customers will need

training requirements, user manual and support.

- The marketing strategy changes from expensive advertising to digital marketing.

- The management styles also change i.e. as de-layering, changes to promotion

policies and appraisals etc.

Change Managing

By implementing computerized system, much of financial data processing will be automated. We need to employ a smaller number of employees in the head office. Staffs will need to be trained to use that computerized system. The new system should target to customers, management reports can be produced that give information such as most/least popular room types. The new system should help improve the profitability of Grunge hotel group.

Some resistance to change is inevitable. When performing with the new system, people's job functions will be changed. Users will try to project blame on to the system and will identify major faults where only minor bugs exist. This can damage the reputation of the system and senior managers can have wrong vision on the system. Careful management is necessary to avoid these kinds of problems. To summarize the way in which resistance to change may manifest itself, the following may be evident:

Aggression – in which there may be physical sabotage of the system, deliberate entry of erroneous data or abuse of system staff.

Projection – where the system is wrongly blamed for difficulties encountered while using it.

Avoidance – withdrawal from or avoidance of interaction with the system, non-input of data, reports and enquires ignored, or use of manual substitutes for the system.

Change management will perform at the organization level, IS and software. The IS change management involves 4 main alternative methods of change over. They are parallel running, phased implementation, pilot system and immediate cutover.

Within the changes of organization, there are many understandable reasons for people to resist the technological change that comes from the development of new information system. These include social uncertainly, lack of perspectives and lack of understanding. The organization makes ensure early participation of users and stakeholders. The organization should makes agreement through negotiation. The organization shouldn't expect too much and develop a reliable system that is easy to main. The organization needs to set realistic expectations and benefits.

Training is important for the implementation of new system. Many staffs are unfamiliar with the computerized system. The organization needs to build in user-friendliness to the new system. Many organizations are afraid to make training because the cost of training or taking staff away from their daily work for several days. The organization needs to make operational training in how to use software and logical training: an explanation of why the system being brought in. The organization will reduce the unnecessary workplace and repositioning of staffs. The organization needs to place servers and other essential equipment to enable the hotel group to utilize I.T.systems. Database management and network management are also necessary for online transaction system. We will need to carefully manage to run the organization under control.

Impact on the changes

- The hotel group can faced staff dissatisfaction.

- There is difficult to manage because of organizational changes.

- The organization staffs will improve their skill and knowledge because of training.

- The organization cannot faced data lose, data duplication by using computerized system.

- Staff will reduce their time and efforts by using online transaction system.

- All booking processes will fast and can process accurately.

- The organization can save the advertising costs by using digital marketing.

6. Reason for outsourcing of the hotel group

Outsourcing is the act of obtaining services form an external source. Functions that are commonly outsourced include cleaning, catering, public relations and information systems. The main reason for outsourcing is to enable focus on the core business and cost reduction. The organization needs outsourcing because of lack of in-house expertise, lack of available staff.

There are sixth types of outsourcing: hardware outsourcing, network management, outsourcing systems development, IS support, Management of IS strategy and total outsourcing. Retaining control method is necessary to make contracts and plans. If the

organizations have no previous experience about outsourcing, we should hire a

specialist to assist in outsourcing in outsourcing agreements. Outsourcing contract

should be managed by using measurement systems and allocating time.

Recommended types of outsourcing for this hotel group are –

Network management – The hotel group needs to manage the network because of

using online transaction booking system. This type of outsourcing includes facilities

management, management of PC and server hardware.

Outsourcing systems development – When specialized programs are required by a

business, it is necessary either to develop bespoke software or to modifying existing

systems. This is also a significant outsourcing activity. Currently the hotel group does

not have websites and all booking processes are made by telephone. So, we should

develop the website for organization by using outsourcing.

IS support - The hotel group can outsources form another third parties. Staffs can face

the application error and difficulties by using those office applications. This could

include answering queries about operating systems, office applications or specific

company applications, fixing problems, etc.

The hotel group can reduce the costs by making outsourcing. The organization

enables focus on the core business. This can give quality improvements and customers

satisfaction. This can also reduce risk of project failure. The organization can get many

benefits such as increased flexibility, access to specialist expertise, free management

time, cost savings, improved quality of service, strategic business decision and improved

financial control. Staffs will be better training, improving knowledge and greater career

opportunities for promotion through working.

7. Steps to resurrect the system in the event of a disaster

The organization can be resurrected quickly in the event of a disaster at head office that

destroys all the servers. The organization can be faced many types of disasters such as

are major terrorist attacks, hurricanes, fire and floods, etc.

The organization should reserve computers to substitute when the old computers are

unavailable. The organization must have power generators to supply the backup power

if the electricity runs out. The system should resurrected quickly in the event of a

disaster at the head office when destroys all the servers. The organization should

prepare a safety place for storing servers and other essential equipment to enable the

hotel group to utilize I.T.systems. The system must enable backup of data. The backup

data must be up-to-date of day-to-day operations. The data must enable recovery

when there is data loss or data duplication in the organization. The hotel group

employees will need training to use the computerized system. The organization must

set their role and responsibilities for all employees. In the head office, all computers

must install antivirus software to protect unauthorized access. All software must be up-

to-date. The organization should consider possible risks and its recommended solutions.

The organization should prepare an emergency online communications page for the

employees.

When the disaster is happened, the organization must recover all booking information.

The organization should keep their employees safety within the safe environment. There

is a communication between breaches when the disaster is happened. The organization

must restore all booking information quickly and easily. The organization can run

normally after the disaster.

8.   Persuading the Managing Director to implement the new system

   We have to persuade the managing director that new systems will be affordable. We

need to explore the payback and return on investment. We need to carry out

discounted cash flow analysis. Then, we need to interpret discounted cash flow analysis

in commercial terms. In this grunge hotel group, there are three types of costs

development costs, setup costs and operating costs.

 In development costs, there can have salaries for all employees involved in the

development, external supplier costs and software costs. We estimate £500 million for

these costs. Setup costs contain hardware and ancillary equipment, data conversion,

staff training, recruitment for new jobs, relocation, disruption and loss of productivity.

We estimate £300 million for these costs. We estimate £100 million for operating costs

which contain support and maintenance.

By implementing computerized, we can also get direct benefits. We can reduce staff costs because of job losses. We can reduce accommodation costs. The hotel group will increase booking rate by using online booking system. The direct benefit of cost saving is estimated to be £100 million annually and other additional benefits will be £50 million annually.

The hotel group can get other intangible benefits. By implementing computerized system, the hotel group will improve their quality and reputation. The hotel group also gets customer satisfaction by improving services to customers. The employees of the hotel group will satisfied because of their tasks are reduced with computerized system. The hotel group will improve management information. For intangible benefits, we estimate £50 million for first year, £55 million for second year and £60 million for third year and £70 million for fourth year and fifth year individually.

We need to calculate payback that is the number of years it takes to recover the initial investment. Payback is calculated by comparing the initial costs against the average

stream of incoming payments or revenues. Annual benefit derived from grunge hotel

group system development implementation and operation can be shown as below.

Year

Grunge hotel group project

Discount rate

0

-£900 million

1.0000

1

£250 million

0.9091

2

£255 million

0.8264

3

£260 million

0.7513

4

£270 million

0.6830

5

£270 million

0.6209

Direct Benefit

Year

1

2

3

4

5

Estimate cost saving

£100

£100

£100

£100

£100

Estimate other benefits

£50

£50

£50

£50

£50

Estimate intangible benefits

£50

£55

£60

£70

£70

Annual benefit

£200

£205

£210

£220

£220

Estimated recurrent cost

£150

£150

£150

£150

Annual net benefit

£50

£55

£60

£70

£70

Total net benefit

£310

Estimate development cost - £900

Estimate net profit – development costs + total net benefits

$$= - £900 + £310$$

$$= £590 \text{ million}$$

Average annual benefits = £590million/5 = £118million

Estimated Payback = Initial investment/ Average annual benefits

$$= £900/ £118 = 7.6 \text{ years}$$

Estimated return on investment = Average annual benefits/total investment*100

$$ROI = £118 / £900 *100 = 20.8\%$$

Estimated net present value = -Development costs + (annual net benefit * discount

rates)

NPV = -£900 + (250*0.9091+255*0.8264+260*0.7513+270*0.6830+270*0.6209)

NPV = -£900+£985

NPV = £85 million

In grunge hotel group, the total benefits estimated cover all total cost. That project

can produce additional benefits for the organization.