

AGENDA OF MEETING

Meeting Title	Supervisor Meeting – Algorithm & Order of Complexity
Date	03-07-2012
Start Time	2000
End Time	2100
Called By	Prof Hady
Venue	Prof Hady's Office
Attendees	Yosin, Jek Bao, Prof Hady
Objective	Planning for scheduling and optimisation

PREPARATION FOR MEETING:

Please Read:	Please Bring:
-	-

ACTION ITEMS FROM PREVIOUS MEETING:

No	Action Item	PIC	Comment	Due Date	Status

AGENDA TOPIC:

No	Agenda Topic	PIC	Due Date
1	Propose Plan	Jek	
2	Bipartite Application (clarify)	Yosin	
3	Technical Architecture (clarify)	Yosin	
4			
5			

MINUTES OF MEETING

Meeting Title	Supervisor Meeting – Algorithm & Order of Complexity
Date	03-07-2012
Start Time	2030
End Time	2130
Venue	Prof Hady's Office
Invitee List	Prof Hady, Jek, Yosin
In Attendance	Yosin, Jek Bao, Prof Hady
Absent	-

DECISIONS:

No	Subject	Decision
1	CSO and CSA	Tricky part: CSO and CSA relationship. CSO can act as CSA but not the other way round. However, we will do this in a later part. Solve a simpler issue first: meaning we treat CSA and CSO differently
2	Jobs and Staff schedule	Assign job to staff or assign staff to job. Better idea: assign staff to job as staff timeslot is more flexible. <ul style="list-style-type: none"> - Use staff assign to job, without considering their roster. - If we are to consider roster later, just assign extremely high cost/ infinity cost so as to eliminate the timeslot from schedule - Attach cost to each timeslot and choose the min. cost as the timeslot
3	Half an hour issue	Difficult for bipartite matching as bipartite matching
4	Notion of cost	It is a penalty to undesirable outcome Cost can include 'break hours' Capturing cost is important
5	Efficient	Among the first 30 people
6	Hypothesis	We can come out with similar schedule as SATS' only if we can capture the most of the costs
7	Proposal	<ol style="list-style-type: none"> 1. Consider ways of doing things and choose one that is suitable for our issue 2. Present Problem formulation – cost function and so on <p>Suppose want to do this in optimal way is too expensive –NP hard problem, in theory, meaning it is polynomial problem $O(n^x)$ and thus not a practical solution.</p> <p>Thus, we should use Greedy algorithm – read Travelling Salesmen problem</p>
8	System Architecture	Interaction between systems, user, DB

ACTION ITEMS:

No	Action Item	PIC	Comment	Due Date	Status
1	Read Travelling salesmen - Chapter 12	Yosin, Jek		07/07/2012	
2	Understand the complexity of the problem and prepare proposal	Yosin, Jek		07/07/2012	

CARRY-OVER ITEMS FOR NEXT MEETING:

No	Subject	Description

NOTES:

Prepared by,

Vetted and edited

Yosin

Endorsed by supervisor,