#### **PASS Project**

Promoting and Extending Value Management Professional Services in Belt and Road Regions

## International Conference Project Creation and Survival via Value Management

29 June 2019 at Metropark Hotel Kowloon, Hong Kong

organized by
Hong Kong Institute of Value Management

Using Value Methodology for Partnering, Quality and Risks Management

Presented by

Sr Ki-cheung Tang
FHKIS RPS(QS) FSZCEA FHKIVM FCECA
Director, K C Tang Consultants Ltd.



Sr. Tang is a Fellow Member, a council member and a List B Facilitator of HKIVM. He has conducted over 30 VM and partnering workshops.

#### **Abstract**

The Housing Department in Hong Kong requires its projects to conduct partnering workshops

while

the Architectural Services Department and other government works department in Hong Kong require their projects to conduct VM workshops or integrated workshops covering VM, partnering, quality, risks, and integrity managements.

Partnering, quality and risks managements all adopt a cyclical series of processes for continual improvement.

The processes are very similar to that adopted by VM.

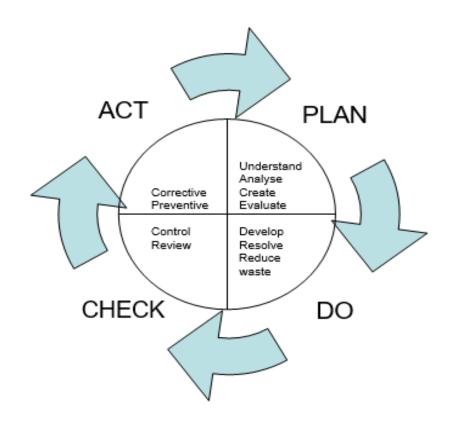
The systematic value methodology can be effectively applied to conduct the integrated workshops.

Sr. Tang would share the similarities, the workshop agenda, and some observations about the outcomes of the past workshops conducted.

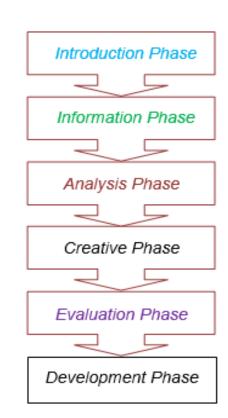
This should be useful for likely project team members wanting to positively contribute to and gain something from these integrated workshops.

#### Similarities

#### **Quality Management Model:**



#### Value Management Model:



Licensed to HKIVM for publication for public view. Copyright retained by the speaker.

# Similarities (Cont'd)

	QUALITY MANAGEMENT MODEL	HEALTH & SAFETY MANAGEMENT MODEL	RISK MANAGEMENT MODEL	VALUE MANAGEMENT MODEL
	Quality Policy	Safety Policy	Mandate and Commitment	
<b>→</b>	Plan	Plan	Establish context	Prepare Introduce Understand
			Interest 6	Identify • Goals / Objectives
			Identify • Risks	Identify • Issues / Concerns / Risks
				Create  • Value options
4.			Evaluate • Risks	Value options
Cycle				Develop Solutions
				Action plan     Present findings
		Develop		
	Do	Organize Implement	Treat • Risks	Implement
	Check Control Review	Measure	Monitor, Review and Report     Communicate and Consult	
<b>←</b>	Act • Corrective • Preventive	Audit / Review	Continual Improvement	

## Similarities (Cont'd)

- Similar sequential processes analyse and improve.
- All call for cyclical and continual review and improvements.
- An integration of the various management systems for project delivery:

Success	Backbone	1	Lubricant	
Value added		Value management		
Success	Integrity	Risk management		Non-contractual
Basic	management	Quality Management	Health & Safety Management	partnering

- Integrity management is the backbone throughout, and can be considered as part of the risk management
- Quality, health and safety should be the basic minima that a project should achieve. They are only a sub-set of all the risks which may be encountered
- Risk management is about preventing or mitigating risks in order to make a project successful
- Value management is about adding value to the project on top of mere success
- Non-contractual partnering helps people work easier and smoothly.

#### Focus of the Workshop

#### Enhancing values:

Value 
$$\propto \frac{Functions}{Resources}$$

"Functions" includes prices, benefits, uses, worth, relationship, etc. of ALL parties

"Resources" includes costs, time, labour, materials, plant, effort, waste, etc. of ALL parties

#### Workshop – whole scheme

- Pre-workshop meeting to understand the project
- Pre-workshop survey of initial expectations, major objectives and issues
- Workshop (one day for integrated or half day for partnering)
  - Introduction phase
  - Information phase
  - Analysis phase
  - Drafting partnering charter (partnering attitudes, goals, objectives)
  - Creative phase
  - Evaluation phase
  - Development phase
- Post workshop report
- Regular reviews

## Introduction phase

- Introduction by facilitators
- Workshop objectives
- Ground rules
  - Trust
  - Respect
  - Equal votes
  - No pre-judgement
  - Non-adversarial
  - Better value
- Opening speeches by senior management
- Self-introduction of participants
- House-warming games
- Group photos

## Information phase

- Presentation by Consultants
  - Project background
  - Major design features
  - Expectations
- Presentation by Contractor
  - Site set-up
  - Programme
  - Special measures
  - Expectations

#### Analysis phase

- Surveying partnering attitudes
- Identifying goals and objectives (Why)
- Identifying issues, concerns and risks (negating Why)
- Both through:
  - Group discussions
    - Each group for different aspects
    - Identify as much items as possible
    - Each member writes down a few before group sharing
    - Register all items on a chart before discussion
    - Discuss to expand registered items
    - Do not jump to solutions
  - Presentation by group representatives
  - Voting for the most important items

#### Creative phase

- Creatively proposing actions for priority issues, corporate social responsibilities, safety pledge to achieve the same functions, with action plan (How, By Whom and When)
- Through:
  - Group discussions
  - Presentation by group representatives

## Creative phase (Cont'd)

- Open our mindset
- Brainstorming rules
  - State ideas quickly
  - Quantity more important
  - "Free-wheeling" welcome
  - OK to state the obvious, to repeat, to think out of the box
  - OK to add upon, combine, improve on others'
  - OK to twist or turn around others'
  - No explanation required
  - No criticism, doubting, judgement

#### Evaluation phase

- Cost information not usually available
- Monetary evaluation difficult
- Pair-wise comparison time consuming
- Scoring of marking scheme by groups may be denominated by vocal group members
- Open floor voting is the most expedient method
- Through:
  - Vote by sticking adhesive dots on displayed charts
  - Each member has more than one vote to build up enough votes for priority items
  - Each voting dot may score from 1 to 5
  - Vote in one colour for the most important/serious items
  - Vote in another colour for the most feasible/probable items
  - Seriousness x probability score = usual risk scoring method
  - Importance x feasibility scores = also a good indicator

#### Development phase

- Reviewing results of evaluation
- Adopting action plan
- Presenting results of survey of partnering attitudes
- Agreeing issue resolution matrix
- Agreeing champion team
- Agreeing regular review meetings (structures, representatives, frequency)
- Closing address by senior management
- Closing by facilitator
- Exchanging signed partnering charter
- Photo taking

#### Some partnering principles

#### Partnering is:

- Working TOGETHER instead of against each other
- A PROCESS for relationship building
- A PHILOSOPHY of teamwork and understanding the other parties' needs
- A **COMMITMENT** to cooperate and communicate
- An ATTITUDE of goodwill and trust
- SHARING RISKS with a "win-win-win" attitude

#### Partnering isn't:

- Relaxing contract terms
- Circumventing the processes
- Expecting extra work for free
- An excuse for poor performance
- A cure-all
- Easy!

(Source: <a href="http://www.allanlowe.com/partnering.htm#jump1">http://www.allanlowe.com/partnering.htm#jump1</a>)

## Some workshop objectives

- understand project objectives better
- incorporate core values and corporate social responsibilities in project implementation
- promote awareness of the importance and good practice of planning and design for safety in project construction
- focus on creative co-operation and avoid adversarial confrontation
- build working relationships based on mutual respect, trust and integrity
- establish a more dynamic project organizational structure and clear line of communication
- develop a formal problem solving action plan and dispute avoidance mechanism
- develop a mechanism for conducting the partnering review regularly

#### Some project objectives

- achieve better project value through mutual recognition and development of improvement opportunities;
- enhance effectiveness by preventing unnecessary cost and time escalations, delays, or unresolved issues;
- reduce the project time and improve quality and buildability;
- clarify common objectives;
- clarify project requirements; and
- identify opportunities for simplifying procedures and potential savings in time or costs

# Cultural shift required

#### **Cultural shift required for Total Quality Management**

From	То
Meeting specification	Continuous improvement
Complete on time	Satisfy customer
Focus on final product	Focus on process
Short-term view	Long-term view
Inspection-based quality	Prevention-based
People as cost burdens	People as assets
Minimum cost suppliers	Quality suppliers
Compartmentalised organisation	Integration
Top-down management	Employee participation

(Source: Construction Management – New Directions by Denny McGeorge & Angela Palmer)

# Some tips on goals and objectives

<ul> <li>Of good quality</li> <li>On time</li> <li>Within respective budgets</li> <li>By minimum resources</li> <li>Without fatal accidents</li> <li>With few public complaints</li> <li>Better than expected</li> <li>With added value</li> <li>Plan ahead</li> <li>Identify problems in advance</li> <li>Exchange</li> <li>Exchange</li> <li>Frank</li> <li>Trusting</li> <li>Trustworthy</li> <li>Teamwork</li> <li>Empathic</li> <li>Sharing</li> <li>No blame</li> <li>No cheating</li> <li>Fair</li> <li>Wins for all</li> </ul>	Project	Process	Attitude
Rectify infillediately	<ul> <li>On time</li> <li>Within respective budgets</li> <li>By minimum resources</li> <li>Without fatal accidents</li> <li>With few public complaints</li> <li>Better than expected</li> </ul>	<ul> <li>Identify problems in advance</li> <li>Exchange knowledge</li> <li>Warn proactively</li> <li>Adopt best practice</li> <li>Adopt proven practice</li> <li>Reduce wastes</li> <li>Simplify tasks</li> <li>Cut red-tape</li> <li>Improve buildability</li> <li>Find better alternatives</li> </ul>	<ul> <li>Honest</li> <li>Frank</li> <li>Trusting</li> <li>Trustworthy</li> <li>Teamwork</li> <li>Empathic</li> <li>Sharing</li> <li>No blame</li> <li>No cheating</li> <li>Fair</li> </ul>

# Aligning partnering attitudes

(Note: 35 participants.)

Are these part	nering attitudes?	Number of votes saying			
7		Positive	Neutral	Negative	
守望相助	Looking after each other	33	2	0	
一人計短、二人計長	Two thinking heads are better than one	33	2	0	
同舟共濟	司舟共濟 Sharing when on the same boat		3	0	
搭埋一條船	We are on the same boat	32	3	0	
互惠互利	Mutual benefits	31	4	0	
設身處地	Empathy	31	4	0	
三個臭皮匠,勝過諸葛亮	Three shoemakers are better than a Plato	31	2	2	
有福同享,有難同當	Fortune we share, misfortune we bear	27	6	2	
施比受更為有福	Giving is more blessed than receiving	24	8	3	
施恩莫望報	Giving without expecting return	24	8	3	
合同包個喎	It's included in the Contract	3	17	15	
照本子辦事	Working according to the	2	17	16	

# Aligning partnering attitudes (Cont'd)

Are these part	Are these partnering attitudes?		Number of votes saying			
		Positive Neutral		Negative		
合同包個喎	It's included in the Contract	3	17	15		
照本子辦事	Working according to the book	2	17	16		
規矩係咁	The rules say so	4	11	20		
你負責架嘛	It's your responsibility	3	9	23		
有著數,無回報	Taking without giving	0	7	28		
有事鍾無豔,無事夏迎春	Wife when in trouble, mistress otherwise	0	4	31		
各家自掃門前雪	Sweep the snow at one's own door	0	4	31		
袖手旁觀	Watching with folded arms	0	3	32		
同流合污	Collusion	1	1	33		
見死不救	Your death is not my business	0	2	33		
落井下石	Stoning into the well after he is down	0	2	33		
<b>狼狽為奸</b>	Wolf and fox working together	0	1	34		
你諗你	It's your own matter	0	1	34		
闊佬爛理	None of my business	0	1	34		

Items highlighted in green are negative partnering attitudes to be avoided.

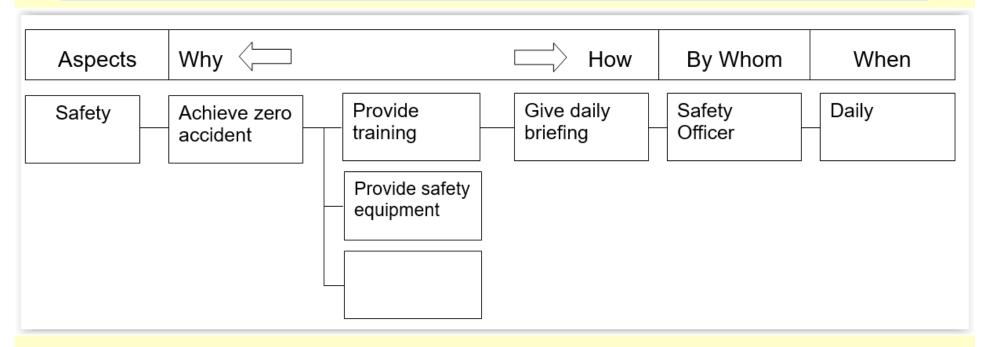
Items highlighted in blue are attitudes which are not absolutely wrong literally, but a better partnering attitude should be like 'It's your responsibility, but let's find ways to help you make your task easier.'

## Aligning partnering attitudes (Cont'd)

(Note: 22 participants.)			
	Positive	Neutral	Negative
Partnering mindset (daily expressions):			
Partnering is required by the senior management	8	7	7
Partnering is a box-ticking exercise	4	6	12
Partnering means you help me for the work	3	3	16
Only applying partnering during final account stage after completion of the Works	2	3	17
Partnering is useless	1	3	18
According to the book, one step can't change. (照足本子,一步都不能變)	0	6	16

Items highlighted in green are negative partnering mindsets to be avoided.

## Bear in mind Why-How Diagram



# Similar to How-Why logic. Useful questions:

- Why do this?
- What obstructions?
- Why not that?
- What can be done?
- What else can be done?

## Goals and objectives scoring

Note: 5 Votes for importance per participant. Each of Client representative's vote scores 2 points, while each of the consultant representative's vote scores 1 point.

	Goals and Objectives	Scores
1	Provide a friendly and home-like facility	
	User-friendly	
	Community-friendly	38
	Homely / home-like environment	
	De-institutionalized	
2	Complete on time	25
3	Facilitate efficient and cost effective maintenance and management	
	Effective / efficient maintenance and management	20
	Good facility for building management	20
	Low operating cost	
4	Foster integration and welcoming design	16
5	Minimize disturbances to community / neighbour	15
6	Represent Client's first initiative for NGOs' involvement	14
7	Encourage community engagement	12
8	Facilitate NGOs' needs collaboratively	
	NGOs' needs interpreted	12
	NGOs' fitting out facilitated	12
	NGOs' operations collaborated	
9	Obtain public acceptance	
	Good community acceptance	11
	Public acceptance	

# Issues, concerns and risks scoring

#### Note:

· Each participant has the following votes:

	Importance	Probability
3 points	4 votes	4 votes
2 points	4 votes	4 votes
1 point	4 votes	4 votes

The final score is based on number of points of importance x number of points of probability.

	Issues, Concerns and Risks	Scores
	Aspect: Design and sustainability	
1	Vehicle circulation	
	Limited space on G/F for loading / unloading	1,628
	Traffic jam	
2	Gender separation for hostels	112
3	Fulfilling needs for de-institutionalization, home environment, user-friendly, way-finding	96
4	Maximization of opportunity of recreation	40
	roof garden (e.g. camping)	40
5	Difficulty in controlling NGOs to fulfill the requirements of sustainability	32
6	Site constraints prohibiting environment sustainability measures	30
7	Additional SOA required for community / social enterprises + involvement resource centres	20
8	Hygiene problem in disposal of personal wastage	18
9	Need to provide environment to promote residents' movement and activities (not staying in bed)	15
10	Kitchen operational and management problems	
	Consuming spaces	6
	Not core business	
11	Duplication of spaces which can be commonly shared	2
	Aspect: Client's requirements and expectations	
12	Lack of space for community participation	1,590

# Action plan

		1	Aspects (Where)			
Goals and Objectives (Where to / Why)	Issues, Concerns and Risks (What)		Actions (How)	By Whom	When	Score
	DESI	GN.	AND SUSTAINABILITY			
<ul> <li>Facilitate efficient and</li> </ul>	Vehicle circulation	•	Provide traffic management	Designer	Now	58
cost effective	Limited space on G/F for	•	Provide turn table and omit column	Designer	Now	50
maintenance and management	loading / unloading Traffic jam	•	Provide lay-by outside	Client / Designer	Now	23
Minimize disturbances to		•	Provide outside parking	Client	Later	20
community / neighbour		•	Provide loading / unloading but no parking	Client	Completed	11
Provide safe and comfortable environment to users	Gender separation for hostels	•	Provide:     Electronic tracking device e.g. 手鐲     CCTV     Signage     Colour zoning of interior     Service user restriction     management	NGO	Fitting out stage	58
<ul> <li>Provide a friendly and</li> </ul>	Fulfilling needs for de-	•	Use more colour	Designer	Now	68
home-like facility  Provide safe and	institutionalization, home environment, user-friendly,	•	Articulate hierarchy of elevation to provide more natural light	Designer	Now	67
comfortable environment	way-finding	•	Use composite wood to elevation	Designer	Now	65
to users		•	Provide more space for personalization	NGO	Fitting out stage	0
Provide a friendly and home-like facility     Provide safe and comfortable environment to users	Maximization of opportunity of recreation     Need to provide environment to promote residents' movement and activities (not staying in bed)	•	Provide: O Roof garden O Roof café / kiosk O Sports / fitness amenities O Self gardening area	Designer	Now	58

#### Issue resolution matrix

Employer	Contractor	Issue Type	Max. Resolution Time	Resource		
		~ Very Senior Managemer				
<position> -</position>	<position> –</position>	Major EOT, variations	3 months for each	Legal advisor		
<name></name>	<name></name>	<ul> <li>supplementary agreement</li> </ul>	issue	<ul> <li>Contract advisor</li> </ul>		
		<ul> <li>solutions of major disputes</li> </ul>		DRAd		
		~ Contract Administration	1 ~			
<position> –</position>	<position> –</position>	Site progress	2 weeks	Contract doc		
<name></name>	<name></name>	Design change	1 week	SE/CE/GE/PSPs		
		Drawing details	2 days	Laboratory		
		Payment issue	1 week	Design team		
		Quality policy	1 week	<ul> <li>TO / Drawing Office</li> </ul>		
		Submission / approval	2 weeks	• IOW		
		Preparation of EOT	1 month	DRAd		
		~ Site Management ~				
<position> –</position>	<position> –</position>	Material submission	2 days for each	Drawing		
<name></name>	<name></name>	Co-ordination	issue	Specification		
1 value	114dillo	<ul> <li>Non-conforming material / installation</li> </ul>		Schedule of rates		
		Safety policy		Contract doc		
		Abortive work				
		Progress				
		Quality of work				
~ Site Supervision ~						
<position> –</position>	<position> –</position>	Workmanship	½ day for each	Drawing		
<name></name>	<name></name>	Non-conforming product	issue	Specification		
	. Tarrio	Safety (site)				
		Site records				
		Procedures				

# Simpler issue resolution matrix

Level of Authority	Issue Type	Max. Resolution Time	
Directors' level	All aspects of the Contract	3 months	
Senior head office level	All aspects of the Contract	2 months	
Head office front line	Contract Administration (aspects handled by the head office)	1 month	
Senior site level	Site management (all aspects on site)	1 week	
Site level	Site supervision (quality, health, safety and records)	1 day	

## Champion team

Employer	Contractor		
<ul> <li><three representatives="" senior=""></three></li> </ul>	<ul> <li><three representatives="" senior=""></three></li> </ul>		
•	•		
•	•		

- Constantly review the progress of the Partnering Action Plan, the achievement of the project goals and objectives identified in the Workshop, the resolution of the issues and concerns identified in the Workshop and such other new issues which may arise during the project implementation and the implementation of the Partnering Charter
- Formulate actions for new issues arising
- Meet at monthly intervals to discuss and rate the performance of the partnering effort
- Suggest areas for improvements

# Partnering action plan

Partnering goals and	1	2	3	4	5
objectives	Poor	Marginal	Good	Very Good	Excellent
1.					
2.					
3.					
4.					
5.					
Overall Rating:					

• Each side evaluates and both sides compare

# Problems with partnering or integrated workshops

- Too late to do value management workshop (usually well after commencement of construction works)
- Do it because the contract says so
- Do it because the technical circulars (rules) say so
- People always too busy
- Difficult to gather all stakeholders at the same time slot
- Busy watching smartphones during workshops
- Busy talking about more important issues of the same project
- Impatient of step by step process
- Treating participation as a routine
- Non-contractual partnering not much financial incentive
- Government officers bound by the books
- Not much flexibility
- Not enough time for integrated workshops
- No cost information for evaluation
- Less-action-items-the-better attitudes
  Licensed to HKIVM for publication for public view. Copyright retained by the speaker.

# End. Thank you!