The VALUE TIMES



WINTER 2021

President's Message

More about Good Habits

In recent editions of *Value Times*, I've been writing about organisational culture and its effect on 'value for money'.

I've made the point that an organisation can have all the latest technology and highly qualified staff, but if its culture isn't 'right', then the likelihood of delivering best 'value for money' to its customers is seriously diminished.

One way to build such a culture is to encourage and nurture 'good habits'.

I touched on this in the Autumn edition when I described the important role that habits play in framing an organisation's culture and I'm going to continue the emphasis on habits in this edition.

The key here is to consciously work on developing a culture in which everyone in the organisation actively works towards achieving best 'value for money'; whatever task they might be working on. This includes internal things such as making arrangements for meetings as well as external things such as ensuring best 'value for money' for customers.

So far, I've focussed on the important habit of asking questions about 'primary purposes'. If we could get all members of an organisation to develop the habit of frequently asking questions about 'primary purposes' then we'd make a positive difference in seeking best 'value for money'.

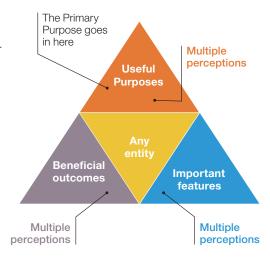
Paying particular attention to 'primary purposes' ensures that what actually needs to be achieved is kept in sharp focus.

Time and again, we have seen major changes to proposals (millions of dollars saved and/or improvements to design) as a result of simply asking questions about 'primary purposes' in a structured group-setting.

Imagine the difference it would make if people did this as a matter-of-habit in their day-to-day work.

The primary purpose of anything, of course, sits inside the apex of the Value Triangle to which I've often referred. Here it is again:

Value Management practitioners are well-accustomed to capturing these



"... the important role that habits play in framing an organisation's culture"

'primary purposes' and they can help others to develop the habit of doing so.

It is worth noting that there is a method to doing this. We always capture 'primary purposes' in the form of an active verb and a measurable noun.

We may wish to expand that verb-noun statement into a full sentence later, but first we make things crystal clear by establishing what the entity actually does (or will do when it's finished and becomes operational) and what its activities impact externally.

It makes no difference whether we're looking at a single cog in a wheel or a whole new hospital; the verb-noun rule always applies.

The question to ask is this: what's the primary purpose of the entity we're considering? The answer is always expressed as an active verb and measurable noun.

Continued on page 2

The VALUE TIMES

President's Message

Continued from page 1

This is one of the first tasks undertaken in any Value Management study.

The point I want to make here is that whilst it is extremely helpful to convene structured workshops in which skilled people (such as Value Management facilitators) ask questions about primary purposes, it is even more effective if project team members themselves develop the habit of doing so as part of normal, day-to-day practice.

This daily practice can then be supplemented with short workshops conducted by expert facilitators who will guide them, step-by-step, through the Value Management process.

So let's keep in mind two applications of what I'm saying. The first one is the day-to-day habitual practice of asking questions about primary purposes and initially identifying them in terms of a verb and a noun.

The second one is the practice of convening what I call "short interventions" – facilitated workshops that go for a couple of hours – in which skilled Value Management facilitators guide you through one or more of the steps of the Value Management process as outlined in the Australian Standard.

I recommend that the first of these "short intervention" workshops be conducted to produce a Value Statement, built around the Value Triangle. This task will, of course, be informed and enhanced in those situations where good organisational habits are in play.

"We always capture 'primary purposes' in the form of an active verb and a measurable noun"

These Value Statements define where the value lies in any entity.

Later in the process, as a range of options is identified, the Value Statement provides the basis for making decisions as to which option will provide best 'value for money'.

(I've described in previous articles the need to separate 'value' from 'money' to determine which option provides best 'value for money'. The value of the entity is entirely captured within the Value Triangle and the resulting Value Statement. The money is determined through normal cost-analysis of options.)

All of this, too, can become an organisational habit — part of the way you do business.

The situation that I envisage is one in which everyone in the organisation plays a part in achieving best 'value for money'. This can be achieved by helping people to develop good habits, starting with those that I've just described.

Then, these day-to-day practices can be supplemented with short, facilitated

workshops that build on the habit-driven activities that have already clarified primary purposes and other important factors.

By the way, this whole matter of habits is the subject of a book which I highly recommend. Its title is *The Power of Habit: Why We Do What We Do in Life and Business*. The book's author is Charles Duhigg.

At one point in the book, Duhigg says that the real power of habit is the insight that "your habits are what you choose them to be".

This is highly pertinent to what I've been saying: "Your habits are what you choose them to be". It is a matter of choice.

All of this takes me back to Peter Drucker's famous quotation: "Culture eats strategy for breakfast".

We know this to be true. We also know that habits form a crucial part of organisational culture. Now, adding to all of that, we see that these habits are a matter of choice.

Dr Roy Barton President, IVMA



2021 Call for Nominations as Member Directors

The board, in accordance with the provisions of Rule 35. D) of the constitution, now calls for nominations from eligible members of IVMA the vacant positions of member director.

Under our Constitution IVMA may have up to 8 Member Directors and so, this year, we are looking for up to five (5) eligible members to nominate as a Member Director to join the Board of the Institute.

Member Directors may hold office for terms of two (2) years and up to four (4) consecutive terms. Within the four-term period Member Directors may re-nominate immediately.

Pursuant to Rule 34 b) of the Constitution 50% (currently 3) of the present Member Directors need to stand down at the **2021 AGM being planned for 19 October.**

Consequently, **Colin Davis, Michael Ord and Ted Smithies** will be stepping down for this election period. Roy
Barton, Mark Neasbey and John Bushell will maintain their Board positions.

To assist Members, key details for consideration include:

- Copy of the IVMA Constitution is available on the IVMA website: ivma. org.au > who we are > governance > click the link to the Constitution
- 2. Rule 32(a) and Rule 11(a)2(i): Member's eligibility as potential Directors is defined;
- Rule 35 (b): An eligible Member who wishes to stand for election as a Director must be financial at the time

"This is your Institute so please seriously consider nomination"

of nomination and be nominated by 2 Members eligible to stand for election;

- Rules 32 and 35: Each of the present Member Directors who have advised they will stand down at the AGM is eligible to nominate for one of the vacant positions;
- Rule 35 (c): The nomination shall be in writing, contain the consent of the Member to be a Director of IVMA and be signed by that nominated Member and the nominating Members;
- 6. Rule 35 f): A nominated Member may submit with their nomination letter, an optional supporting resume of not more than 150 words. Such a resume:
 - 1. may only include details in relation to:
 - 1. the candidate's qualifications and relevant experience;
 - 2. the candidate's contribution to IVMA; and
 - key issues the candidate sees as facing IVMA;

- must not endorse, disparage or otherwise refer to any other candidate or any other Director;
- 3. must not contain anything that is defamatory; and
- 4. must comply with any applicable bylaws or regulations set by the Board.
- 7. Valid nominations for the position of Member Director shall be lodged with the Secretary no earlier than CoB 3 August 2021 and no later than CoB 7 September 2021 at: abutler1950@gmail.com
- The details of Nominees for the vacant Member Director positions together with any supporting resume they supply will be issued to all Members together with the formal notice of AGM.

This is your Institute, so please seriously consider nomination

Alan Butler, Secretary, IVMA

Sydney 2000 Olympics – a Value for

Sydney Showground

Sydney's Royal Easter Show has been an important fixture in the city's calendar for almost two centuries.

The first Easter Show, organised by the Agricultural Society of NSW, was held in Parramatta Park in 1823. Subsequently the venue was changed to Albert Park then in 1881 the Show moved to Moore Park where it remained until it was moved to new facilities within the Olympic Park complex in 1998.

The Easter Show is a combination of agricultural, horticultural and animal breeding and husbandry displays — together with food products, art exhibits and fairground activities.

The Easter Show was typically held over 14 days but the facilities were used for a variety of other events throughout the year. Sports events, cultural exhibitions, motor racing and motoring exhibitions all made use of the Moore Park Showground.

The move to Olympic Park meant that the showground development had two critical constraints:

- It had to be completed in 1998 to permit its former Moore Park site and buildings to be leased to Fox Studios Australia for use as film production studios and a retail component, The Entertainment Quarter.
- The design and construction had to be sufficiently well understood and developed in a way that the showground facilities could be adapted to provide venues for some of the Sydney 2000 Olympic Games activities.

The Showground facilities were the first sporting facilities constructed in the new Sydney Olympic Park, even prior to the construction of main stadium.

The Showground comprises a number of diverse buildings and outdoor elements for which three design consortia were engaged to develop the designs and create the integrated event facilities. The site area was 32.7 hectares accommodating some 140,000 square metres of buildings.

The Value Management Review in April 1996 of the designs and cost plan was an important and timely intervention. There was potentially a significant (30%) overrun against the approved budget.

A multi-disciplinary team undertook the Value Management Review over 3 days, concluding on the eve of ANZAC Day that year. The Executive Team and key operations personnel represented The Showground Trust. Other participants included representatives of the Olympic Coordination Authority, project managers from NSW Public Works and Australian Pacific Projects Corporation, representatives of the three design consortia along with several engineering, environmental and planning consultants. The project's cost planners were also critical contributors to the Review.

The focus of the workshop was not to cut costs but to both understand requirements and test the design solutions for value-for-money.

There was a plethora of new engineering information that was shared along



Sydney Showground at Olympic Park. Photo by: William (Wiki.will)



Money Retrospective – Part 2

with discovery of some additional constraints not previously recognised.

All of these discoveries combined to drive a number of necessary design adjustments — some reduced costs whilst others added costs.

The process allowed for pauses to reflect on options and their implications. No immediate judgments were asked of the group. A whiteboard with the ideas and cost implications was openly tracked over the 3 days and it was only in the final session that firm directions were agreed on the 'value improvement' opportunities.

The potential overrun was eliminated as a by-product of focusing on value-for-money.

A critical change was the reduction in the number of seating levels in spectator stand in the main Showground Ring without compromising spectators' views. The completed facility still accommodates 20,000 seated spectators — with fabulous visibility and easy access.

Other buildings and external facilities were also functionally tested and affirmed.

The net result over the 3 days was to bring the costs of the designs to within \$15 million of the approved budget. The OCA offered a further capital injection of \$10 million — which ultimately wasn't needed.

The design teams were able to complete their designs and the facilities were constructed within the original budget (\$363 million) and on schedule to stage an Easter Show, to fully test the facilities and those of the new Olympic Park Station prior to the Olympic opening event.

The memorable closing comment from the then-General Manager of the Showground Trust was that "I've found the whole thing terrifically valuable".

The performance of the facilities during the Games was highly regarded by all, with the facilities winning many awards for design, construction and environmental operating performance.



The Dome of the Media Centre

The Media Centre

Broadcasting rights sold by the International Olympic Committee were the biggest contributor to the Sydney Olympic Games revenue, totaling \$US1.33 billion, 45% of the total revenue raised.

The Sydney Olympic Broadcast Organisation provided a raw broadcast feed of 3,500 hours of Olympic action, covering more than 300 competition and ceremonial events.

To achieve this, more than 4,800 accredited print journalists and more than 1,100 accredited photographers worked day and night from the Main Press Centre and more than 12,000 television network personnel from around the world were headquartered in the International Broadcast Centre at Olympic Park.

The Games provided an unprecedented two hundred and twenty countries with a total of 29,600 hours of broadcast feed that was received by 3.7 billion viewers. Internet viewing peaked at 1.2 million hits per minute.

The Media Centre, housed in the dome and three halls of the Exhibition Centre, was a busy place 24-hours a day for the duration of the Olympic and Paralympic Games.

A critical issue developed with delivery of the Media Centre when, during construction, it became evident that at the then-current construction progress the required completion date would not be met.

A Value Management Study was established to address and resolve this major program issue. The Study reviewed the critical path program with members of the construction team, which resulted in the team identifying a 4-week saving in construction time. The team delivered this time saving thus ensuring completion of the Centre on time.

Mark Neasbey Chair Education Committee, IVMA

John Bushell Chair Publications & Events Committee, IVMA



Facilitator's Casebook

For more than 25 years David Baguley has facilitated hundreds of Value Management workshops. In this column, David will highlight the versatility of the Value Management process and tools by sharing Case Studies that demonstrate how 'value for money' can be delivered in different ways.

Case Study # 7:A Symbiotic Management Approach *

Situation

In the late 1980s a new, 'base load'
Power Station was commissioned in
Central Queensland; strategically located
1.2kms from the contracted coalmine
to minimise coal transport costs.

Not only did the cost of coal represent 75% of the Power Station's operating budget, but also the reliability of coal supply impacted achievement of Station availability targets.

Both organisations benefitted when the power station maximised its coal burn. Meeting contractual requirements for quality and delivery rates, together with the actual characteristics of the coal, presented both organisations with challenges.

The implementation of design procedures for receiving, handling, milling and burning of coal, as well as the management of dust and control of quality and tonnages at the power station, highlighted significant operational problems.

For the mine, the discontinuous nature of mining operations resulted in extra costs for stockpiling and re-handling of coal to achieve agreed delivery arrangements.

Process

The Value Management team, with representation from the mine and the power station, reviewed all aspects of the supply system for the coal from the mine 'face' to the boiler feeders at the Power Station.

The team examined ways to improve arrangements for delivery and handling that would reduce costs and provide mutual benefit. The team was directed to consider

the optimum operation of the total coal system with commercial barriers removed.

The Functional Analysis of the total system allowed the team to develop an understanding of each organisation's processes, operational costs and problems that impacted the optimisation of the total system.

Functions were described using active verbs and measurable nouns as described in the President's Message in this edition.

Each function was analysed to identify assumptions, major influences, concerns, technical parameters and, finally, ideas for improvement.

Outcome

A total of 37 recommendations covering coal production, coal handling, coal analysis and communications were presented for joint consideration by Management at the Mine and the Power Station.

More than 30 of these recommendations were approved and implemented without impacting on commercial arrangements. For example:

- It was found that the lack of coordination between the two organisations had resulted in additional production, stockpiling and re-handling costs; most of which could be avoided by simple changes to operating procedures.
- The team developed proposals to overcome problems with coal blockages at the mine crushing plant and inadequate reclaim rates from the Power Station long-term stockpiles that put continued 'base load' power generation at risk.

- The modification of operating procedures and rectification of plant design deficiencies helped address the imposed costs and significant hazards caused by the generation and dispersion of coal dust throughout the system.
- A reduction in stockpile sizes and a 'just in time' delivery principle resulted in significant Capital Cost savings and avoidance of the need to augment some systems. Sharing of mobile plant helped overcome short-term outages that would have impacted the financial outcomes for both organisations.

Lessons Learnt

- Optimising each part of a system does not necessarily result in the optimisation of the whole system.
- Contractual arrangements predominantly reflect risk-based analysis to protect each party and do not result in optimal operation. Redefining coal quality in terms of minimisation of operational impact permitted greater flexibility for both organisations.
- Considerable duplicated effort could be avoided by development of mutual trust and improved communications.
- 4. The redefined relationship between the Mine and the Power Station assisted the Station in achieving a 12-month, rolling availability average of 99.3% in the period following the study.
- * Reference: Michael Fewster, Murray Bailey Coal Production to Power Production – A Symbiotic Management Approach,

David Baguley
Chair, Appointments &
Accreditation Committee,
IVMA



Could do better...

The following is a summary of the Grattan Institute's (GI) May 2021 report **Megabang for Megabucks: Driving a harder bargain on megaprojects.**

This Grattan Institute report examined major infrastructure projects and compared cost outcomes with the original tender price and also with overseas experience of similar projects.

The Institute found that there was considerable scope to achieve better 'value for money' (VfM) for the community. For example:

- About 25 per cent of projects end up costing taxpayers more than the government expected when construction started.
- Australia's transport infrastructure
 costs are above the global average,
 and there is a culture of caving-in
 to contractor demands and paying
 sometimes hundreds of millions of
 dollars to settle a problem a few months
 or years after a contract is signed.
- A key issue was the rising number of megaprojects — which was defined as those costing more than \$1 billion and the few companies that can carry out such large works. Megaprojects, some costing in the tens of billions, have been on the rise due to low interest rates and lucrative government asset sell-offs.

Overall the report found that:

- 1. Australian governments don't care enough about costs
- Governments are too concerned about what industry wants
- 3. Competition is fundamental to effective procurement
- 4. Governments should aim for the right procurement procedure for the job

The report's findings are important because

projects with a contract value exceeding \$1 billion have increased significantly as a proportion of total capital works since 2017

Drilling down into these findings revealed the following.

- 1. Australian governments don't care enough about costs:
- Governments rush to market, and often end up paying more than they expected
- Governments don't follow the example of countries that build at lower cost
- Governments don't collect benchmarking data to track how much infrastructure costs over time
- Contracts with local content requirements risk increasing cost
- Better scheduling of transport infrastructure construction could reduce costs

Key points were that:

Projects costing over \$1 billion across all categories of infrastructure projects experienced cost increases during construction of 28%, resulting in a median cost overrun of \$627 million.

Australian governments don't learn from similar countries that build quality infrastructure at lower cost (costs in New Zealand, the UK and USA are similarly high).

Australian governments don't time their construction pipelines to take advantage of times when inputs are cheaper i.e. during a recession or construction industry downturn.

2. Governments are too concerned about what industry wants

- Industry claims of low profitability aren't government's problem
- There's no evidence of a widespread exodus of firms from the sector
- Government construction work has not been significantly impacted by the pandemic recession
- 3. Competition is fundamental
- There is no shortage of competition for contracts up to \$500 million, but beyond that point, competition diminishes
- But gigantic contracts are becoming more common
- On gigantic contracts, a joint venture of two tier one construction firms risks an uncompetitive price
- International firms have won megaproject work, and this must continue
- Market-led proposals reduce competition
- Greater transparency would reduce the risk of collusion and inadequate competition

Key points were that:

For the largest contracts, joint ventures between tier one firms are most common, meaning competition is even thinner so the introduction of international entrants is very important to the competitive landscape.

Market-led proposals are unlikely to deliver good value. By way of example, they make up almost a sixth of Victoria's transport megaproject spend.

More transparency would reduce the risk of collusion. The state of NSW is doing it better than other

Continued on page 8

The VALUE TIMES

Could do better

Continued from page 7

states in this regard. Queensland's public works tendering process might best be described as opaque.

- 4. Governments should aim for the right procurement model for the project
- Bundle the work packages efficiently.
- Risks should be allocated to construction partners only where it's economical to do so.
- A more systematic approach to selecting contract type should create incentives that are in the taxpayer's interest.

Key points were that:

State governments often rush projects to market, so they can announce and start them before the next election. But in the rush, governments don't always identify or mitigate expensive problems such as contaminated soil, and they're not systematic enough about dividing projects into bundles or choosing the contract type with the right incentives and the right risk allocations for the particular project.

The pendulum has swung away from the more collaborative alliance contracts.

Public private partnerships provide an incentive for firms to deliver on time and on budget, but they can be prone to disputes.

Recommendations

The GI report made the following recommendations to ensure better value for the taxpayer when procuring infrastructure projects.

Pay more attention to costs

- Governments should only sign contracts that they are prepared to enforce.
 They should show by their actions that they will not pay additional amounts.
- Regularly benchmark road and rail construction costs.
- Study international best practice on cost management and cost reduction.
- Coordinate state schedules and collaborate with neighbouring states to minimise costly bottlenecks.

"The pendulum has swung away from the more collaborative alliance contracts"

 Avoid giving preference to bidders for transport infrastructure construction projects who pledge to use Australian-produced materials.

Improve transparency

- If governments decide to provide industry assistance to the engineering construction sector, they should do so transparently and on-budget.
- Publish a central register of all projects larger than \$500 million, on a comparable basis across projects and jurisdictions.
- State auditors-general should provide an expert panel governing negotiation of major public construction projects.

Foster greater competition

- Publish weightings of the criteria used to select the winning bid for a contract. Do not weight local experience too heavily.
- Award all infrastructure contracts through an open tender process.

Don't rush: scope projects properly, and procure systematically

- Perform sufficient discovery of site conditions before going to market, and certify to potential bidders what's been discovered.
- Develop and use a systematic approach to bundling work packages and selecting contract type.

So how could the IVMA's VfM approach contribute here?

The stakeholder-driven team process has been proven to deliver innovative ways of delivering project functionality whilst reducing risks and allocating them to the party best able to manage them.

But the area in which VfM works best is in the brief and concept design stages of a project or program of works — a project delivery area not addressed in the GI report.

As the stakeholder team identifies the components of the three areas of the Value Triangle, the operation of the project over time becomes apparent to the whole team which can often yield long-term benefits as well as delivering improved return on capital investment

In his recent President's Messages Dr Roy Barton addresses these initial stages of a project and organisational culture. This edition's President's Message particularly addresses the habits that individuals in an organisation should develop to deliver best VfM so that its achievement is 'built-into' the system in the first place.

This has been demonstrated in the two articles on the successful Sydney Olympic Games in this and the previous issue of Value Times.

So can we do better? Yes — but it takes ongoing commitment!

John Bushell Chair Publications & Events Committee, IVMA

The full report is available at: https://grattan.edu.au/report/megabang-for-megabucks/