

The Art and Architecture of Powerful Questions

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*"The important thing is to
never stop questioning."
A. Einstein*

Einstein invites us to continue questioning. Why? This query provokes a variety of impassioned responses:

- Questions are a prerequisite to learning.
- Questions are a window into creativity and insight.
- Questions motivate fresh thinking.
- Questions challenge outdated assumptions.
- Questions lead us to the future.

In fact, with little effort, it is easy to justify the critical role of questions in the development of human knowledge. Nobel laureats will often attribute their experience of successful scientific achievement to asking the right questions. And in much simpler business situations, we have all experienced the importance of asking the "right question." Indeed, if questions are so critical to the capacity to create and the development of human knowledge, we wonder why our public educational system focuses upon memorization and static answers rather than the art of questioning. In contrast to the typical western education, the distinguished Chilean biologist, Humberto Maturana, was recently asked how his schooling influenced his innovative thinking. He replied that he had attended an experimental high school in Santiago where half of their grade was based upon the quality of the student's questions, not their answers.

The Corporate Learning Conference dialogue focused upon the **art and architecture of powerful questions**. We started by attempting to define a "powerful question," and by considering several examples:

What time is it?

How do you make strawberry ice cream?

What does it mean to be human at this point in history?

Clearly, these three questions differ in terms of power. But how do we describe the difference? And what is the art and architecture of a powerful question? Our prolific dialogue group offered several diagnostics:

A powerful question...

- stimulates reflective thinking.
- challenges assumptions.
- is thought-provoking.
- generates energy and a vector to explore.
- channels inquiry, promises insight.
- is broad and enduring.
- touches a deeper meaning.
- evokes more questions.

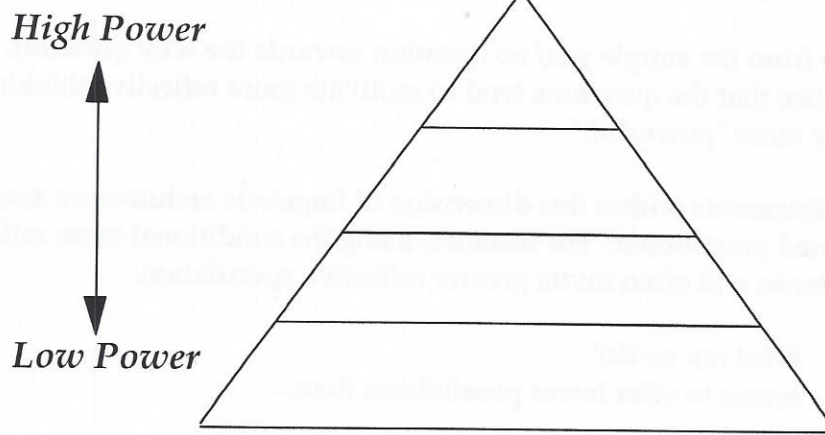
Satisfied that we had a working definition of a *powerful question*, the dialogue group turned its attention to the art and architecture -- HOW does one ask a powerful question? One dimension of power clearly must have to do with the linguistic architecture alone. Operating independently of the meaning and scope of a question is the language structure which holds the question. We know, for instance, that salespeople observed decades ago that "open-ended" questions were much more powerful for stimulating a sales dialogue than "closed-ended" questions. "*Do you have any problems with your fax machine?*" tends to yield fewer selling opportunities than "*What problems have you experienced with your fax machine?*"

There are exceptions to every rule. We must keep in mind that in the example above, we are describing a consultative selling process where the objective is to stimulate reflective thinking by probing for needs and concerns. When the context changes to closing a sale, a question like, "Can I write up your order now?" is clearly an **important** closed-ended question, while it may not be a powerful question, as defined above.

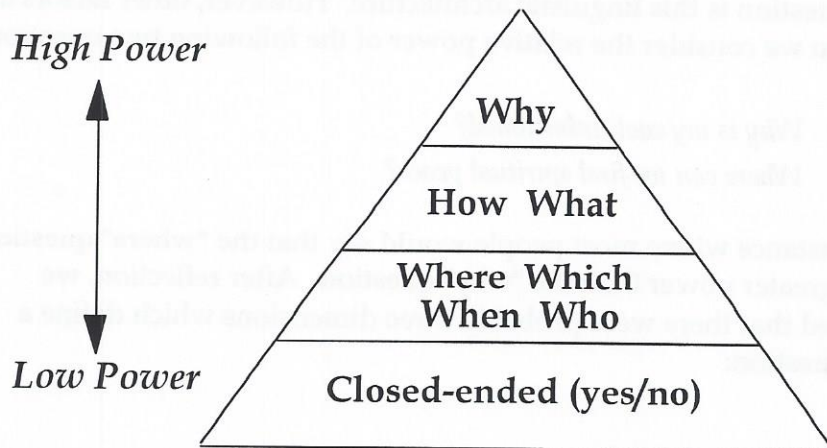
This open/closed distinction can be expanded into a richer hierarchy of power through systematically exploring the linguistic architecture of questions. In an exercise MicroMentor first designed for Polaroid's Creativity Lab, participants discover the basic linguistic architecture of questions when they are asked to place the following words into a pyramid of low to high power:

WHO WHERE WHEN WHY
 HOW WHAT WHICH

The Linguistic Architecture of Powerful Questions



Most groups working on this dimension of linguistic architecture produce a variant of the following general hierarchy:



The general thesis is that virtually any question can be converted into a more powerful question by moving up the pyramid. As an example, consider the following sequence:

Are you feeling okay?

Where does it hurt?

How are you feeling in general?

Why do you suppose you aren't feeling well?

As we move from the simple yes/no question towards the why question, you probably notice that the questions tend to motivate more reflective thinking, and are generally more "powerful."

There are refinements within this dimension of linguistic architecture available to an interested practitioner. For instance, using the conditional tense rather than the present tense will often invite greater reflective speculation:

What can we do?
seems to offer fewer possibilities than...

What could we do?

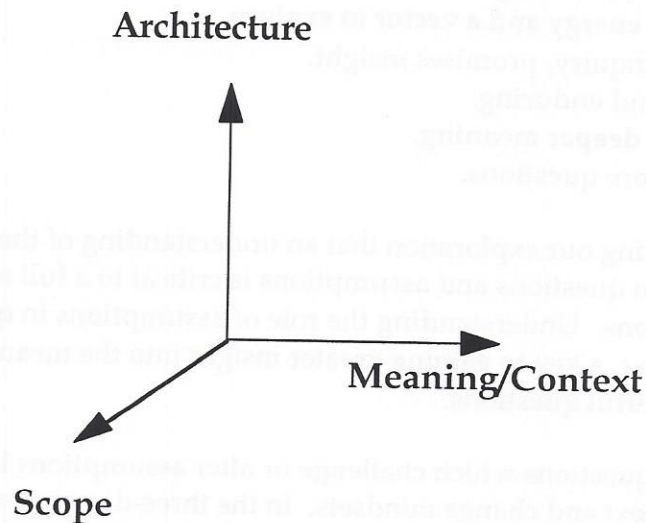
The dialogue group concluded that clearly one dimension which defines a powerful question is this linguistic architecture. However, other factors are also at play when we consider the relative power of the following two questions:

Why is my coat unbuttoned?

Where can we find spiritual peace?

This is an instance where most people would say that the "where" question has somewhat greater power than the "why" question. After reflection, we hypothesized that there were probably three dimensions which define a powerful question:

Three Dimensions of Powerful Questions



The Scope Dimension of Questions

The "scope" dimension suggests that questions which encompass more people, more volume, more time, or more concerns have greater scope, and tend to be more powerful questions. An example might be the following contrast:

How should we manage our salesforce?

How should we manage the planet?

In this example, the question increases in scope and the implied "we" increases in scope as the object changes from salesforce to planet.

The Meaning/Context Dimension of Questions

The "meaning/context" dimension is a more complex, subtle axis and commanded the attention of the group for most of the dialogue. One way of defining the meaning/context axis is to return to our definition of a powerful question, and highlight the characteristics which describe the meaning/context axis. Questions which are powerful in terms of meaning/context probably exhibit the characteristics shown in bold type below:

A powerful question...

- stimulates reflective thinking.

- **challenges assumptions.**
- is thought-provoking.
- **generates energy and a vector to explore.**
- channels inquiry, promises insight.
- is broad and enduring.
- **touches a deeper meaning.**
- evokes more questions.

It became clear during our exploration that an understanding of the nature of the interaction between questions and assumptions is critical to a full appreciation of powerful questions. Understanding the role of assumptions in questioning may be, in particular, a key to gaining greater insight into the meaning/context dimension of powerful questions.

We observed that questions which challenge or alter assumptions have the power to shift context and change mindsets. In the three-dimensional model, these questions would naturally locate themselves further to the right (higher power) on the context/meaning axis. An example might serve to elaborate this dimension. Compare the two questions:

How can we compete with the Japanese?

How can we collaborate with the Japanese?

The second question shifts the context, and opens up a different exploration and a different set of subsequent questions. We hypothesized that the art of re-framing questions as practiced in fields such as neuro-linguistic programming must implicitly be operating on this axis of meaning/context as well.

Developing the conscious ability to articulate more powerful questions along this dimension may hopefully become one of the more popular courses in the transformed public education system of the next century.

Our final exploration led us through an examination of what happens to assumptions through the incisive articulation of powerful questions. Borrowing on the computer model of Create, Read, Update, and Delete, we decided that questions may have one of the following four impacts upon assumptions:

Create

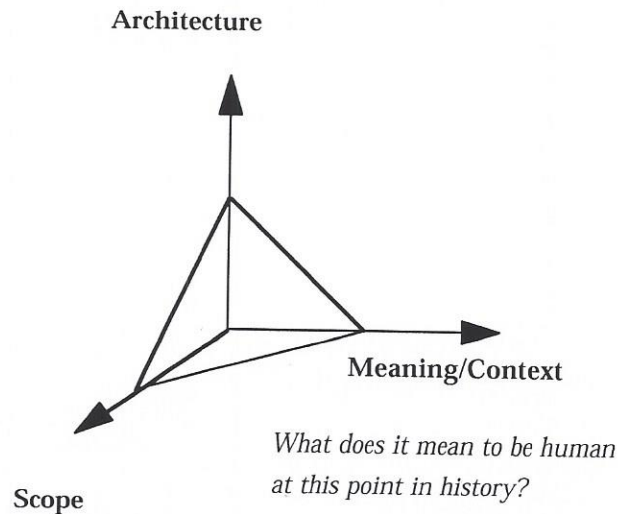
Reinforce

Alter

Destroy

The order of these verbs may reflect the power of the question. For instance, it is much easier to reinforce someone's prevailing assumption than it is to alter it.

Similarly, it is generally easier to create a new assumption than destroy an existing assumption. Therefore, as we explore the nature of powerful questions, we might ask, "How does this question interact with the listeners' assumptions?" If the answer is that it alters or destroys the listener's prevailing assumptions, we have identified a more "powerful question." Returning to our model of powerful questions and our sample high power question, we might map the question onto the model somewhat like this:



Models have value only if they provide insight and lead to different actions. I invite the reader to play with the three-dimensional model of powerful questions offered above. Start with the blank model below and map the following three questions:

- What time is it?
- How could we make the world's best strawberry ice cream?
- How can we bring meaning to our work?

Then attempt to increase the power of each question by changing first its architecture, then its scope, and finally its meaning/context, the art of powerful questions.

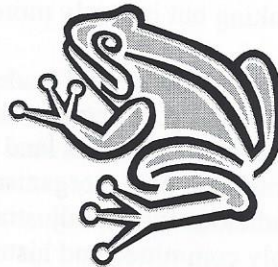
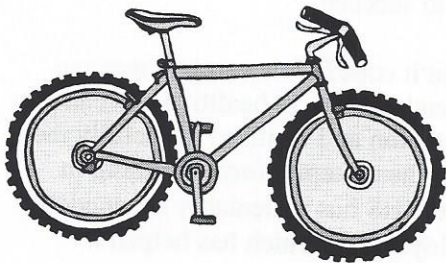
YELLOW SUBMARINES AND AILING FROGS

- Coping with the current changes in the NHS

You do not need to spend much time in the company of NHS leaders and managers today to be struck by the pervasive sense of frustration, weariness and cynicism which many feel as they face yet another round of NHS “re-disorganisation”. However, more alarming than the inevitable sense of concern for their own jobs and their staff, is a worrying unease at the lack of an apparent compelling narrative for the current changes. In other words, it is not easy for frontline senior managers and clinicians to explain why the current changes are happening and how they will improve things for either patients or staff. The NHS itself feels decidedly ill-at-ease as the financial squeeze comes on like never before and more far reaching policy reforms than seen for generations begin to take root.

This short article attempts to explain why the NHS might feel like this and how leaders might cope through the current change process. I will use two metaphors for this – Frogs and Yellow Submarines

Systems thinking - Frog and Bicycle.



Alistair Mant describes system complexity using the colourful metaphor of the frog and the bicycle¹. You can improve the performance of a bicycle by changing its parts; what you do to the chain sprocket is largely independent of what you do to the front wheel bearing. But you cannot do the same to a frog, which is a complete, complex, interconnected organism. You can take bits off the bicycle, change them and put them back. You can, to a limited degree, do the same to a frog – particularly no doubt with the general increase in surgical sub-specialisation! However, at some point, the frog can take it no more, and dies.

Mant provides several examples, mainly from the UK public sector, in which managers, trying to ‘improve’ their own defined areas of responsibility, caused huge damage to the wider whole system. Rail privatisation is an obvious example most of us have suffered with in some way. Another is the idea popular with government that scripted call centres can offer a more efficient public service than discussing your problem with real people.

A key characteristic of the public sector is interactive complexity and interconnectivity – which is surely especially so for the NHS. What happens in one part will affect other parts. The NHS, perhaps even more so than other parts of the public sector needs a large

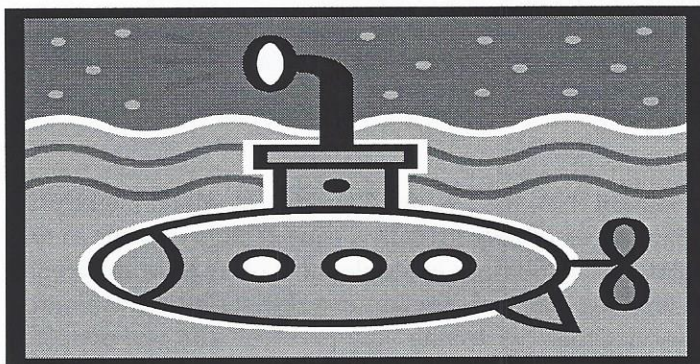
amount of coordination, and people at all levels who understand the complexity of healthcare systems, and who can see the big picture. In essence the NHS is much more like a frog – albeit a big one - than a bicycle. To describe organisations as living organisms is well accepted in organisational theory and practice.² For leaders to consistently act like it is true is perhaps a bit rarer.

It seems to me that the current application of major policy changes to the NHS [choice, contestability, etc.] alongside further reorganisation of SHAs, PCTs and Ambulance Trusts, increasing financial strictures and the establishment of Foundation Trusts smacks of bicycle thinking. Whilst each individual policy or structural change may make sense in its own right, when put together they are in danger of making the frog very sick. They do not necessarily all add up to improve the whole. They also are arguably more than the NHS system can healthily take at the same time

Clearly major change is needed in performance and responsiveness as public expectations continue to rise. However if you understand the NHS is more like a frog – a large complex living organisational system - you will approach bringing about sustainable and profound change in a more sensitive and organic way. You will seek to craft national policy and top management change differently. We need to make the whole frog more healthy and fit, not just swap its bits for higher-tech ones. This may be more challenging than bicycle-based thinking but is surely more likely to succeed.

So the NHS frog is unwell. How should leaders within it cope? How can you manage yourself, your colleagues and your services through such system ill health? How can you maintain a healthy focus in the no-mans land of in-decision and waiting? Hopefully there will be a better time coming – post reorganisation and the system reforms bedding in after no doubt some judicious further adjustment. The NHS has undeniably tremendous resilience and incredibly committed and historically loyal staff which has helped it survive thus far.³ I am therefore hopeful that the frog will survive despite the bicycle repairman's attentions.

We all live in a Yellow Submarine



I think we are in unusual times, which call for a specific leadership response. I would propose NHS leaders consider another metaphor for these times – the yellow submarine. I

was visiting a local primary school in a deprived and socially isolated community. Indicators for unemployment, broken families, crime and ill health all ran well ahead of the surrounding affluent and generally prosperous town. Yet within this challenging context the primary school was getting good results and had a great reputation with an inspirational headteacher. On her office wall I was struck by a large picture painted by the children of a yellow submarine. The Head described it as a symbol of the school she led. It was a safe space to be within when navigating a troubled sea, with clear rules and boundaries where teachers, pupils and helpers worked together with clear purpose, for a better future.

It strikes me that NHS leaders could consider creating their own "yellow submarines" for these turbulent times. In other words they need to deliberately seek to create and describe for their staff and the patients or clients they serve locally a safe space with clear system boundaries and a clearly defined, if limited, immediate aims. Within this space staff would be encouraged to pull together as a team or teams with a clear sense of direction through today's choppy waters.

As stated above organisations are frog-like complex adaptive systems that are shaped by their environment. They also constantly influence their environment - there is constant two-way feedback. This should guide how leaders usually facilitate the engagement of their organisations with their environment.

However NHS leaders at present might consider the yellow submarine as a short-term protective mechanism against what seems like a very "toxic" environment at present. The yellow submarine - unlike a frog - seeks to isolate itself (and its contents!) from the environment. This is only ever going to work as a short term protection strategy. As soon as the environment is more benign, leaders should once again focus on creating a sustainable (symbiotic) relationship between their organisations and the environment.

What might this look like?

I was in a similar position some years ago as a Chief Executive of a community/mental health Trust being disestablished to set up several local PCTs and a specialist mental health Trust. As a Board and Executive team through the last few months, we deliberately focussed our efforts on progressing a key PFI scheme and actively "neglected" less important agendas. We also sought to facilitate appropriate "grieving" for the ending of the Trust and preparation for what was to come. This sought to enable the new NHS organisations to make effective starts.

In PCTs today understandable fear of what restructuring might bring, can breed fear and cynicism which paralyses improvement. Many acute Trusts are afflicted by the "P45" culture. Chief Executives, Directors or senior managers can instead seek to create for their staff a "yellow submarine"- a safe and supportive working environment with regular communication and support for personal development. They can seek to actively focus staff teams on clear short-term aims which deliver clear patient benefit. They can actively manage their team(s) agenda and boundaries to facilitate this.

However before submerging in your submarine - a warning! Keep your periscope up. Be aware of the changes around you and who you need to keep in contact with. And at some stage you need to leave the submarine behind.....

Within the yellow submarine leaders are seeking to create a safe space for staff and patient care – where cynicism and fear does not paralyse continuous improvement. Too often times of change and merger have seen much needed improvement delayed, expected benefits not delivered and good staff lost.⁴ Most NHS leaders can not influence the overall NHS system level decision-making – but they can and must lead with purpose and sensitivity despite the ailing Frog. There will come a time of recovery and renewal – though the Frog may be a little different by then. Until then do you need to build a yellow submarine for your staff and services?

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¹ Alistair Mant *Intelligent Leadership* (Allen & Unwin 1997).

² See for example Arie de Geus 'The Living Company; growth, learning and longevity in business' 1999, Nicholas Brearley Publishing."

³ Anglia and Oxford Regional office "Sustaining the NHS" 1998

⁴ Braithwaite, J. "Invest in people, not restructuring", *BMJ* 2005 331: p. 1272-1272