

Improvement Leaders' Guide  
**Working in systems**  
Process and systems thinking



## Improvement Leaders' Guides

**The ideas and advice in these Improvement Leaders' Guides will provide a foundation for all your improvement work:**

- Improvement knowledge and skills
- Managing the human dimensions of change
- Building and nurturing an improvement culture
- Working with groups
- Evaluating improvement
- Leading improvement

**These Improvement Leaders' Guides will give you the basic tools and techniques:**

- Involving patients and carers
- Process mapping, analysis and redesign
- Measurement for improvement
- Matching capacity and demand

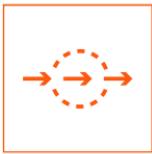
**These Improvement Leaders' Guides build on the basic tools and techniques:**

- ▶ • **Working in systems**
  - Redesigning roles
  - Improving flow

You will find all these Improvement Leaders' Guides at [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

Every single person is enabled, encouraged and capable to work with others to improve their part of the service

Discipline of Improvement in Health and Social Care



## Contents

1. What is a system?	3
2. Where and how do I start?	14
3. What needs to happen?	28
4. Activities	34
5. Frequently asked questions	48

This Improvement Leaders' Guide to working in systems is only a start. It is a 'simple introduction' to something that we know is very complicated and complex: our health and social care system.



# 1. What is a system?

## 1.1. Why are systems important?

Every system is perfectly designed to get the results it gets. If we want better outcomes, we must change something in the system. To do this we need to understand our systems.

Don Berwick, President and CEO, Institute for Healthcare Improvement (IHI) USA

We work in systems all the time, we cannot get away from it! Our work, our home, our social life, our hobbies are all systems and, as we know, will all interact with each other at some stage.

It is just the same in health and social care. As a patient, the teams delivering your care directly affects your experience. You want to know that your care is as effective as it can be and that everything is being done to reduce delays, duplications and risks. But as someone working in health or social care, you know that how you and your team works depends upon lots of other things besides your personal skills:

- the way a GP works and refers his patients affects the demand at the outpatient department in the local hospital
- the number of beds for older people in the community can affect how long people have to wait in A&E to be admitted
- the way the discharge process in a hospital works will affect the work of the health visitor
- how you work depends on things such as culture and leadership, Information Technology (IT), human resource strategies and the ways in which funds are organised in your organisation

Increasing interdependencies between working teams, departments and organisations means that local solutions to problems are often not sufficient. What we do impacts upon others and what others do impacts upon us. These are the challenges and the opportunities of systems.

This Improvement Leaders' Guide will help you understand your system a bit better. It will suggest ways to improve the systems within your organisation as well as looking across the organisational boundaries into your healthcare community. **Beware:** working in systems is not a linear process: step 2 does not necessarily follow step 1 but you need to start somewhere!

## 1.2. What is the difference between a process and a system?

### It is all a question of scale

**Processes** are the components of a system. A process is a series of connected steps or actions to achieve an outcome. They have purposes and functions of their own but cannot work entirely by themselves.

A **system** is a collection of parts and processes organised around a purpose and each system is embedded in other systems.

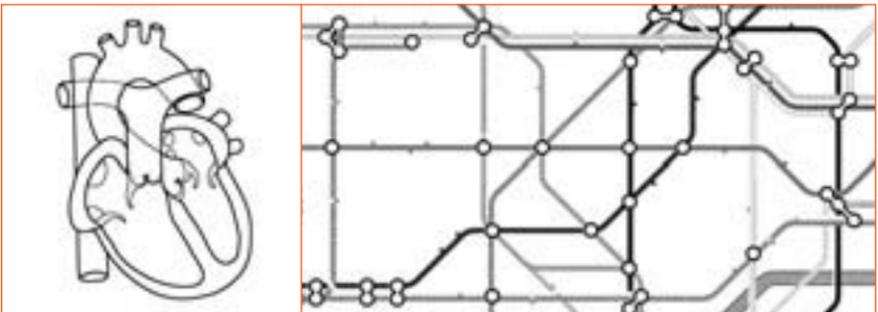
It might help you to think about the cardiovascular system or the London Underground system as examples.

In the **cardiovascular system**, the process is the way blood passes through the heart: from the vena cava into the right atrium then into the right ventricle and off to the lungs via the pulmonary artery. It returns to the heart by the pulmonary veins into the left atrium and into the left ventricle before leaving the heart in the aorta. You could map the process as described in Improvement Leaders' Guide: Process mapping, analysis and redesign

[www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

This would show the route the blood takes, any bottlenecks caused by disease, and you could, with the right equipment, measure how long it took the blood to get from the right atrium to the left ventricle. These are all the important things to understand about a process.

However the heart is only one part of the cardiovascular system. The process of blood going through the heart is affected by all sorts of other things such as exercise, hormones, disease, blood volume, etc. Each of these needs to be understood when thinking about how the heart works.



You could also think about the **London Underground system**. This is made up of lots of different processes such as the process for buying a ticket or the process of travelling by tube from Bank to Bond Street station on the Central line. Everything needs to work together as a system for things to run smoothly and you know the effect if one part breaks down.

Each process is part of at least one system, and each system is part of bigger systems, which are in even bigger systems, which are in even bigger systems etc. etc. etc.

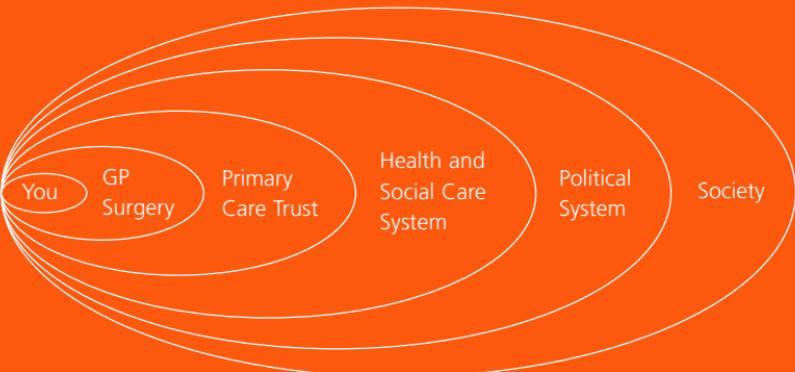
So think of a system as the whole picture and a process as just one part of the picture.

### Example: Systems within systems within systems, etc.

Imagine yourself in the role of a receptionist in a GP practice. It seems that your whole job is fielding customer demands and complaints that are not in your control to do anything about. Today's list of things to sort out seems impossible and you don't know who to talk to.

For instance, Mr Kamur keeps calling to find out whether his GP could speed up the date for his cataract operation. Ms Jones, who lives in France, is concerned that her mother was not getting the right support at home following her hip operation. She wants to know who is helping her do her shopping. The school nurse has again referred John Smith for persistent ear infections, but the GP feels, again, that the referral is inappropriate. Three patients have come in requesting urgent repeat prescriptions, and the local pharmacy has rung up to say they have run out of a common drug.

You feel at your wit's end. You cannot solve any of these problems by yourself nor can your GP practice. What you are facing are 'systems' problems.



## 1.3 How do you describe a system?

Health and social care organisations are complex adaptive systems. **Systems** in the sense that there is coordinated action towards some purpose. **Complex** in the sense that there are many and varied relationships among parts of the systems, making detailed behaviour hard to predict. **Adaptive** in the sense that people who make up the systems can change and evolve in response to new conditions in the environment

Plsek 2000

### Structures, processes and patterns

Very little in health and social care is simple - we know that. In fact many of our systems can be considered to be complex! Physicist and complex-system scientist Fritjof Capra, has demonstrated that complex systems comprise structures, processes and patterns (SPP) and this model is increasingly being used to describe and improve systems in health and social care. If we want fundamental and transformational change in a complex system, we must consider interactions and changes in each of these three elements: **structure processes and patterns**

### Structures

Such as:

- organisational boundaries
- layout of equipment, facilities and departments
- roles, responsibilities
- teams, committees and working groups
- targets, goals

Our experience so far:

- we are very familiar with structure. Time and time again, when improvement is required, the first action is to change the structure - often with very little effect

## Processes

Such as:

- patient journeys, care pathways
- supporting processes such as requesting, ordering, delivering, dispensing
- funding flows, recruitment of staff, procurement of equipment

Our experience so far:

- we have gained a lot of knowledge about how to understand and improve processes, bottlenecks, etc. and have made some excellent advances. Read the Improvement Leaders' Guide: Process mapping, analysis and redesign [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

## Patterns

Such as:

- thinking, behaviours
- relationships, trust, values
- conversations, communication, learning
- decision making, conflict, power

Our experience so far:

- patterns are often ignored and remain unchanged and unchallenged within systems, despite changes to structures and processes
- much of the advice in this Improvement Leaders' Guide: Working in systems is about developing improved patterns of relationships. Read also the Improvement Leaders' Guides: Managing the human dimensions of change and Building and nurturing a culture of improvement [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

For more information about structure, processes and patterns read the work of:

- Capra F (1996), The Web of Life: the New Scientific Understanding of Living Systems, Anchor Books, New York
- Capra F (2002) the Hidden Connections: Integrating the Biological, Cognitive and Social Dimensions of Life into Sustainability, Doubleday, New York
- Plsek P, Greenhalgh T (2001) The challenge of complexity in healthcare, BMJ, 323:625-8
- Plsek P, Wilson T (2001) Complexity, leadership and management in healthcare organisations, BMJ, 323:746-9

Human-intensive systems are not machines; though we often treat them as if they were.

## 1.4 Clinical microsystems

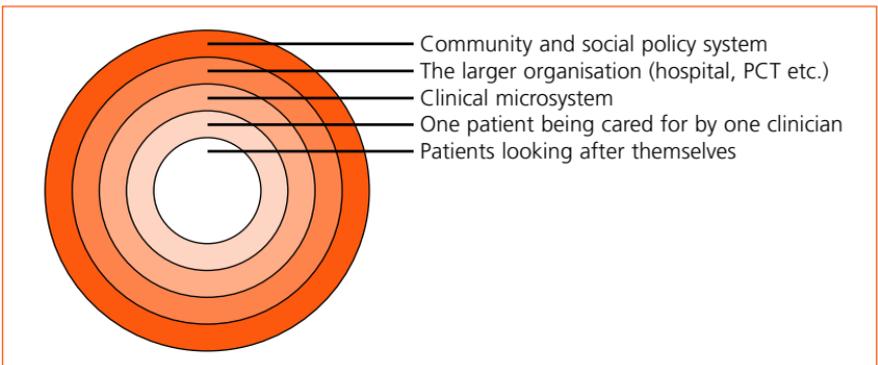
There are plenty of examples of people working within clinical microsystems throughout health and social care: the departments, units and practices of larger organisations, such as hospitals and Primary Care Trusts. Clinical microsystems are where groups of 20 and 70 people from different professions come together with supporting processes and information to offer care to a particular population of patients (customers) who are considered to be an integral part of the microsystem. The use of clinical microsystems as a framework for service improvement was developed at Dartmouth Hitchcock Medical School in the US who defined a clinical microsystem as:

...the small, functional, front-line units that provide most healthcare to most people. They are the essential building blocks of the health system. They are the place where patients and healthcare staff meet. The quality and value of care produced by a large health system can be no better than the services generated by the small systems of which it is composed.

### Levels of care

Care of patients takes place at different levels. Think of it like the layers of an onion with the patient at the centre. The levels of care are:

- the individual patient looking after themselves: steam inhalation for a cold or managing their own anticoagulation regime, etc.
- a single clinician interacting with a single patient: an outpatient appointment, a district nurse changing a dressing, a GP consultation, etc.
- a team of clinicians and support staff: on a ward, in a general practice, a cardiology department, social services department, etc. This is the **clinical microsystem**
- in the larger organisation: a hospital, a Primary Care Trust, a Care Trust, etc.
- the outer 'layer' of the community, legislation and policy framework, etc.



### Why focus on the microsystem level for improvement?

This is the layer that has the biggest impact on overall patient experience. It represents the most effective place to work to achieve widespread change whilst ensuring that improvement remains practical, relevant and manageable.

### The five Ps

This approach involves building the self-awareness of the team members working within the microsystem. It helps them to comprehensively examine their current structure and function and to develop an understanding of the systems, processes and patterns that connect them.

The five Ps framework is used to describe the key components of the work of a micro system and is used to guide investigations into areas of work, leading to the identification of improvement needs. The five Ps are:

- **purpose:** a clear, agreed and shared understanding of the fundamental aim of the team's work
- **people:** the views, attitudes and experiences of the staff working within the microsystem
- **patients:** the characteristics, needs and views of the patients subject to the care of the microsystem
- **processes:** the routines and procedures for undertaking the work of the microsystem
- **patterns:** data providing insight into the performance of the microsystem.

This knowledge then provides a basis for the identification of priorities for development, as defined by the team members themselves, informed by the needs of their patients.

The benefits of this approach are that:

- the entire staff team (both clinical and non-clinical) are included in the analysis, planning and execution of improvement work
- the focus of improvement or development is based on an understanding of needs from both patient and staff perspectives, giving equal weight to the views and needs of those working in and using the service
- the microsystem approach fits well with current improvement thinking and can be used to coordinate and relate disparate strands of improvement activity.

For more information on clinical microsystems go to [www.neynlha.nhs.uk/localprojects/clinicalmicrosystems](http://www.neynlha.nhs.uk/localprojects/clinicalmicrosystems)

## 1.5 Why is 'working in systems' important?

It is important because:

- we all want to improve things for our patients
- we cannot escape from working in systems - it is a fact of life
- all systems are embedded in other systems
- smaller systems can limit the change in larger systems, and larger systems can limit the change in smaller systems
- health and social care systems are getting increasingly complex
- a change you make in your area, no matter how well intended, could make things more difficult for others in the wider system
- whatever you are trying to achieve in your own service will almost always need the co-operation and support of others from different professions, departments, organisations or sectors
- we need to find ways, with all our partners, to develop long term sustainable improvements

So, a key reason for thinking about the system is to prevent adverse consequences that can occur in other parts of the system when you introduce a change in your area. For example, a small change in the time of discharging a patient to a nursing home may cause a negative impact on the transportation service, the receiving carers, kitchen staff and visiting General Practitioner at the nursing home. It may also cause problems for the relatives who would like to be at the nursing home when the patient arrives.

By working together we can make really great improvements for those who use our services

## Case study

The Pursuing Perfection Programme aims to deliver standards of care not currently seen in this country, engaging the whole community in modernisation which is driven by the voice of the patient and service user.



They define the whole system 'as comprising of service users and their carers, the individual teams delivering care, the community of organisations providing integrated care to its population and the environmental context set by policy, regulation and social-economic factors'.

## 1.6 How do I recognise that a 'systems' solution is necessary?

We would say you need a systems solution when:

- a satisfactory solution would benefit other teams and organisations as much as your own
- a variety of ideas have been tried but the problems never seem to go away
- ideas you have tried in the past have given rise to complaints from others, such as when a hospital tries to manage its waiting list by asking GPs to hold back referrals and the GPs do not like the idea
- your challenge always seems to fall into the 'too difficult to do' box and feels impossible because you think it requires agreement and co-operation from too many people

### **Example: The 'knock on' effects of making a decision in one part of the system**

Hospital ward staff are unclear of the criteria for referring patients to social services. This results in a large number of inappropriate referrals which overburdens the system and leads to wasted time for care managers in social services who need to respond to each referral. This results in delays in seeing other patients that in turn leads to delayed transfers and blocked beds in the hospital. The 'knock on' effects could include cancellation of elective admissions and emergency patients having long delays in A&E. The acute Trust will be unable to meet elective and emergency waiting time targets, and social services lose credibility and money, as well as it being a very poor outcome for service users.

### **With a bit of planning it could be like this**

The hospital ward manager decides their staff will invest time getting a clear understanding of the referral criteria to social services. This frees up the care managers' time in social services as there are far less inappropriate referrals. This allows other assessments such as occupational therapy and podiatry to be speeded up. All this means that patients are not delayed, everyone feels a lot happier with the service they either give or receive, there are financial savings and it helps all the organisations concerned to meet their targets.

Can you think of your own examples?

## 1.7 Why should I get involved in 'working in systems'?

It means that everyone sees the whole, specifically from the perspective of the user and looks at patterns of events, rather than working in isolation.

Advantages for everyone using our services:

- co-ordinated services organised around the user
- multidisciplinary teams provide a flexible and coherent service and seamless care across the organisation or community
- clarity, co-ordination and improved communication amongst all staff so that everyone involved understands the inter-relationships between individuals, teams and other parts of the system
- vision, objectives, actions and resources are all agreed and shared

It should also improve your own experience and personal satisfaction, as there will be:

- better outcomes for users
- less complaints from patients and colleagues
- less duplication of tasks that take up a lot of your time
- less frustration at not being in a position to help improve your part of the service
- more time to develop and work on quality services
- connections made with colleagues in other departments and organisations
- improved efficiency, effectiveness, outcomes and the utilisation of resources

Ask yourself, are you really:

- prepared to give something up in order for the whole to benefit?
- willing to spend time getting to know your counterparts in other departments and organisations, understanding their roles, and developing a long term working relationship with them?
- passionate about creating a new style of working where both staff and service users have good experiences?
- able to work with partners to identify what currently works in the system and review whether it can form the base for other changes?
- passionate about creating a new style of working where both staff and service users have good experiences?

**Remember:** don't stop making process improvements. This is still the place to start!



## 2. Where and how do I start?

There are no right answers about where to start and there is no single way to do it. You need to approach it with an open mind, a keenness to learn and a passion to make things better for staff and service users.

### 2.1 Identify the potential for improvement

See activity:

#### 4.1 Defining your system

One of the first things to do is to think about the boundaries of the system. There are many different ways to describe the boundaries:

- around a specific user group such as care of older adults
- as a health and social care community defined by a geographic boundary
- around disease groups such as coronary heart disease

But don't worry if you cannot define the system initially. Set a boundary, and re-examine after starting. Don't get hung up on the details.

However, it helps if all the departments or organisations in the system have a shared understanding of the problem and a general agreement about the need for improvements from the beginning. It is perfectly reasonable for one part of the system to raise an issue and to engage with other groups to resolve it in a constructive and systematic way.

---

## 2.2 Get the right people together

See activities:

4.2 Assessing the level of relationships

4.3 Engaging the right people

Working in systems is all about developing relationships and talking, so ask yourself the following questions.

### Who is going to help you lead this project?

How do you get your clinical and managerial leaders to help and work with you. One of the key things we have learnt is the importance of the role of senior leaders across the whole systems supporting the changes. For example, you may, in time, need a change in policies, procedures and working patterns, so you want early support from senior leaders who have the authority to agree to you exploring different working arrangements.

### How can you work with current systems and networks?

Find out who meets together either formally or informally, tap into and work with those groups.

### How do you get people working together?

We all feel better about change when we feel involved. So involve people in identifying what needs to be improved as well as getting them to test improvement ideas. But remember that different people need to be involved at different times, in different ways, and for different reasons.

### Who do you need to invite?

Across a system there will be a variety of different groups, professions, departments and possibly organisations. Think about how you are going to engage with all those people. But get started, don't wait months for everyone to become engaged.

There is a lot of really useful advice and information in other Improvement Leaders' Guides particularly the Personal and organisational group

[www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

## 2.3 Do you have a culture for improvement?

The process of creating an improvement culture starts by understanding the way things are done within your system. This is not easy because people are often not aware of their culture, or the subject might even be regarded as not open for discussion.

The Improvement Leaders' Guide: Building and nurturing an improvement culture [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides) will help you to understand your culture better. It introduces some tools to enable you to gain a general overview of your culture and help you to uncover a deeper understanding of why things are done the way they are.

### Expect some tensions

So spend some time recognising, acknowledging and working with these differences which could be areas of tension. Look out for:

- different models of care such as health and social care models, medical and nursing models
- different loyalties such as to the team, the profession, the department or the organisation
- differing targets and performance frameworks
- different definitions and understanding of roles and responsibilities
- different IT systems
- different budgets

### Look for polarities

These are sets of opposites that cannot function well independently. Because the two sides of a polarity are interdependent, you cannot choose one as a solution and neglect the other: you need to manage them both. The objective of polarity management is to get the best of both opposites whilst avoiding the negatives of each.

Examples of polarities across a system include:

- excellence in certain parts of the system versus equity across the system
- costs versus benefits
- flexibility versus agreements
- project management versus mainstream management

For more information about polarity management and dealing with these tensions read Johnson B (1996) *Polarity Management: Identifying and Managing Unsolvable Problems*, HRD Press, Michigan.

## Case Study

A health community wanted more patients to remain supported in their own home to reduce the many unplanned admissions to the acute hospital. They were experiencing severe pressure on beds, which in turn was causing pressure in the A&E department and a high cancellation rate for elective treatments.

The scheme appeared to have the support from all the key stakeholders, but initial results were disappointing. After some evaluation and discussions, the acute Trust, which was leading the initiative, realised that it had failed to take account of the working practices of GPs in setting up the scheme. When faced with a patient who needed urgent support, the GPs found it difficult to contact a number of different services to try and mobilise the care needed. The alternative was making a single call to the ambulance service or Medical Assessment Unit to advise them they were going to admit the patient. This easier course of action was often followed due to time pressures.

So, the Trust established a single point of access where GPs could phone and describe the support needed and a small team could mobilise care packages or arrange admission as appropriate. The result was an increase in use of the alternative services and a significant reduction in trolley waits and cancelled operations.

A health community in the South West

## 2.4 Look at the system from different perspectives

You need to look at all the various components and perspectives in your system. There tend to be multiple perspectives, with multiple objectives that may be unclear and even conflicting. This does not mean that the system is bad or wrong; it just means that it is complex and can feel messy and chaotic at times.

You will need to keep an open mind. Blaming individuals, departments or organisations slows the improvement process down, lowers morale and seriously jeopardises any good intention. Co-operation and creativity are key to moving forward and making a meaningful difference to service users' experience of the system.

### Appreciative Inquiry (AI)

When you look at any system which involves people, including those in health and social care, you might find it useful to look at Appreciative Inquiry. The term 'appreciative' comes from the idea that when something increases in value it 'appreciates' and by 'inquiry' we mean the process of wanting to understand by asking questions. Therefore AI focuses on the things we value and want to increase in the system. For more information read Watkins and Mohr (2001) *Appreciative Inquiry*, Jossey-Bass Pfeiffer, San Francisco.

Bear the following points in mind as you begin to 'inquire appreciatively':

- recognise the needs of the service user: define and keep focusing on improvements around user needs
- regularly do 'language checks': ask if any jargon is being used that prevents understanding. It is hard to understand different perspectives if the words used are not clearly understood by all. Remember jargon alienates!
- map the relevant services with all your partners: demonstrate how the various parts of the system fit together and are interdependent
- build your knowledge base: understand the different performance frameworks, commissioning arrangements, infra structures, processes and protocols such as those used for sharing information, meetings, referral and complaints procedures
- use the 'what's in it for me' framework: for each of the departments or organisations involved in the system ( *Improvement Leaders' Guide: Managing the human dimensions of change* [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides))
- identify common ground and shared vision between partners in the system. Keep referring back to what we all care about and have in common: improvement of the experience and outcome for our patients
- manage expectations: communicate to everyone the activities, progress, successes and issues so everyone knows what is happening and what to expect

## 2.5 Discuss and agree what would be a 'perfect' experience for the patient

Only service users know and are able to define their 'perfect' experience. The whole process of caring should be based on their needs. Achieving this requires a vision shared by all the different groups. This should be a process of dialogue, debate and discussion with service users; it is not a consultation exercise. The focus should be on understanding what service users and staff want to happen.

There are a lot of ideas about how to involve patients and carers in the Improvement Leaders' Guide: Involving patients and carers

[www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

### Case Study

#### Patient promises in the Pursuing Perfection Programme

A Pursuing Perfection Team wanted to identify a vision against which to plan 'perfect care' for their fractured neck of femur project.

##### 1 Clinician needs and wants

The team first facilitated a workshop with clinicians across the system of care in which they were asked to consider what goals they wanted for the service. From this emerged the following list:

- we want our patients to be free of pain - assisted by specialists from the pain relief service
- we want our patients to be seen by an experienced physician and surgeon prior to surgery
- we want our patients to have their surgical operation during the day on a scheduled theatre list, performed by competent specialists in orthopaedic surgery and anaesthesia
- we want skilled nurses caring for patients pre and post operatively within a defined area (in an identified ward)
- we want early aggressive rehabilitation available seven days per week
- we want accurate and prompt diagnosis and treatment for post operative complications

Continued on next page

- we want our patients to have the best management of continence
- we want all our staff to be enthusiastic about this group of patients and for patients to have access to all the support they need
- we want expert support for the common post-operative complications
- we want close and effective co-operation with colleagues in community hospitals to provide seamless continuing rehabilitation where necessary, as close as possible to patients' homes
- we want to be able to measure objectively improved outcomes, including patient-centred quality of life assessment tools
- we want to minimise the rate of recurrent fracture, by (a) effective secondary prophylaxis of osteoporosis and (b) specialist assessment and treatment of falls risk using multidisciplinary teams

## 2 Patient needs and wants

Similarly two workshops were run to explore the perspective of people who had recently experienced a fractured neck of femur. They said

- I don't want to be in pain
- I want to be able to walk
- I want to be able to look after myself
- I want to know what has and is going to happen to me
- I want to be involved in the decisions made about me
- I want to be safe
- I want to know that I am being looked after properly when I leave hospital
- I want to be able to do what I want to do
- I don't want it to happen again
- I want my family and relatives to be able to come and see me
- I want the help I need at home
- I don't want to wait
- I don't want to feel forgotten once I am at home
- I want to be confident that I've had the best treatment

## 3 Developing system based patient promises

When the team looked at the outcome of both these exercises they found that there was a strong correlation between the needs and wants of the different groups. From this the team has committed to a series of promises to their users.

Continued on next page

Patient needs and wants	Promise
I don't want to wait	Your surgery will be performed by specialists on a daytime scheduled list within 24 hours of admission. You will have access to early aggressive rehabilitation which will be available seven days per week
I want to be able to walk, look after myself and be able to do what I want to do	Our enthusiastic staff will ensure that you have access to the necessary support you need
I want the help I need at home. I don't want to feel forgotten	Our enthusiastic staff will ensure that you have access to the necessary support you need
I want to be safe and know that I am being looked after properly	Your surgery will be performed by specialists and skilled nurses who will care for you pre and post operatively in a defined area
I want to be confident that I've had the best treatment	You will have the best management of continence You will be seen by a specialist physician and surgeon prior to surgery You will be diagnosed and treated for post operative complications promptly You will have access to early aggressive rehabilitation available seven days per week Skilled nurses will care for you pre and post operatively within a defined area Underlying medical conditions will be managed Your care and treatment will be evidence based
I don't want to be in pain	We will take all reasonable steps to ensure that you are free from pain
I don't want it to happen again	We will actively seek to prevent a recurrence through management of falls and osteoporosis
I want to be involved in the decisions about me and know what is happening to me	You will be seen by a specialist physician and surgeon prior to surgery



## Discovery interviews

This is a method to elicit the views and experience from those who use the whole system. There are a set of carefully designed, open-ended questions that enable staff to hear the service user's story at key stages, such as:

- thinking there was something wrong
- seeing someone in the NHS
- having tests to find out what was wrong
- receiving treatment
- living with the condition

These experiences are fed back and should directly inform the redesign of the system to create that 'perfect' experience.

Warning: you might need to get ethical approval for this work. Look at the Improvement Leaders' Guide: Evaluating improvement, for guidance and advice [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

## Case study

### A discovery interview from the Coronary Heart Disease Collaborative

#### 1. Thinking something was wrong

I had been pushing myself hard - keeping fit at the gym. I was worried, my father died of a heart attack at 45 years old. I had been busy - went to play football, although I didn't feel like it, when I came off the pitch, I ached all over, especially my upper body. My chest and arm ached. I felt exhausted, I rested for one hour, and then I went and dug over a vegetable plot and planted some stuff. My chest really ached. I ached all over. Then I went to bed; I really ached - thought I was getting flu.

The next morning I went to work and became hot and flustered and was sweating profusely - I had pain in my back. I rang home for some painkillers - Ibuprofen, I have back pain so thought it was that. I continued working - then I became hot and tight again. I was really anxious. Had a drink of water and at that time, I felt that something wasn't right.

Was talking to two elderly ladies and had to tell them that I didn't feel well and needed to see a doctor. They said you don't look well! So I got in my car, to drive to my GP, I only got a third of the way there when I developed severe pain in the chest. I had to stop the car and I thought, this can't be happening to me. I decided to continue to the surgery, then there was no where to park. I got out and stood there. Made my way to the door and couldn't get in.

Went to the GP receptionist's desk and said "Help!" She said, "Do you have an appointment?" I was leaning on the desk heavily; two nurses had to help me into a back room. I kept asking, "What is wrong with me?" and they wouldn't say. Then I heard the GP say on the telephone "We have a Cardiac problem and need an ambulance". I would have liked, someone to have said what was happening. The ambulance took some time to come, I was very scared. The nurse was furious that the ambulance took so long to come.

## 2. Seeing someone in the NHS

Whilst in the ambulance they radioed through, so I bypassed Accident & Emergency and went direct to CCU. This was good, as I was frightened to go to Accident & Emergency as I have seen what happens there on TV.

On my third evening they were very busy and it was about 10.30 pm. I was woken up and asked to move to another Ward. I didn't want to go but couldn't say that. My anxiety went right up the 'creek'. I didn't want to leave the safety of CCU. It was dark and I didn't know where I was going.

I was got up and put in a wheelchair and wheeled across to another ward. I was put in a dark ward, I couldn't see much. I was put on the bed with my drips at the wrong side. I thought, "Where am I?" It was really scary. The man opposite was complaining of wetting himself and another was just sat staring, in his chair. There were two nurses on duty and they were buzzed, all night. I would have liked to have been moved on my third day, in the daytime! And know in advance that I was going to be moved. There were too many unknowns. It was more frightening than when I was admitted. I couldn't go and say hello to people!

One big criticism I did have, were the nights. They were too noisy! One patient had a TV on until 10pm and even when this was switched off, you could hear another "blaring" out, down the corridor, or staff would be talking. You could just hear their voices all night. They were so busy - everyday we had a different nurse - not like on CCU. I wasn't sure what I could and couldn't do. They said "please yourself". Then when I had a shower it did me in!

I was told I had to stay longer as an in-patient and was quite relieved, as I felt safe in hospital. Then they said, "you can go home today". I had my lunch, then they said, "we need your bed, we are sorry". So I was moved to the discharge lounge - it was confusing. They said "your drugs will be here at 2pm". It was 7pm when they arrived! I just wanted to go home! When I got home, I was scared! Another big shock was when I was presented with all these pills. They tried to explain. I thought "God, am I going to have to rely on these for the rest of my life?"

I didn't get enough information about them until the GP saw me the next day. I was really anxious all week.

Continued on next page

### **3. Having tests to find out what was wrong**

On CCU they did an ECG, gave me an aspirin and got the doctor. The nurse never left my side. She called me by my first name, which helped and she was very reassuring. The doctor came. I kept saying, "What's going on?". I was agitated. I said, "What is happening to me, I need to be home for 10 o'clock!" Then the nurse became concerned, I think my heart rate was down. She said, "cough" and I was sick, all over the nurse. I felt bad about this.

### **4. Receiving treatment**

My wife arrived then and I could see the concern in her face. I knew something was really wrong from this.

The nurse told me about some of the treatments, but told me other things later. She could have told me more than I remember. I was relieved to have all the attachments: the monitor, drips and things. The nurses all told me their names and who was looking after me - that was nice! I was drugged up, so at this stage, I felt quite easy.

### **5. Being told what was wrong**

The next day the nurses explained the treatment I was having. The Consultant told me my diagnosis. I saw him every day and he talked to me on my level.

I remember one day, I lifted my meal cover off and it was sausage roll and chips - a strange diet for someone in CCU.

### **6. Getting better**

I was impressed that the nurse fully explained how long I would be in, what the diagnosis was and how long I would be off work. She went through everything with me. It was nice to know what the set pattern was. I had the Cardiac Rehabilitation video and discussion.

This was good but I tried to deflect the seriousness of the situation. They were all very good nurses and they made me feel at ease, I have a high regard for them.

### **7. Living with your condition**

The GP couldn't understand why I was on so much medication, so tried to take me off some of it. The GP was very good. He kept coming to see me, to see if I was OK! I did as I was told - as per the sheet I had been given.

I tried to get better too quickly; one day I was walking to the Post Office and an old chap overtook me. I was so embarrassed!

The health visitor came to see me at home, she was excellent. She spent over an hour talking to me.

It was several months after and I realised that I hadn't had a call up for the Cardiac Rehabilitation Programme. So I followed it up and got on it - it was brilliant. I could have done with it sooner. I enjoyed it immensely. It was all done in a controlled environment, and the talks: I couldn't cope with the talk on resuscitation! It made me feel very anxious. I really think we should have Cardiac Rehabilitation much sooner.

I had good support from the dietitian - seen three times, but felt that I needed more.

### **8. Being followed up**

I had my exercise test at six weeks. I was told that I would get my result from my doctor, - why couldn't they have told me there and then? Any tests you have you obviously want to know the result straight away, like on TV. They go away and come back, with the result!

When I returned to out patients, I expected to see the consultant, but saw his junior. I was perturbed I really wanted to see the consultant. He said the test was OK, so I could go back to work. I was anxious to get back to work.

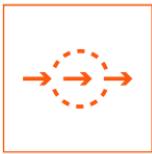
Then they said I needed an echo. I waited months and months for this test.

### **9. Have you any other comments?**

Ehmm! Well, I know the NHS is under a lot of strain, but, I think I would have liked to have known when I was to have my Echo, instead of the waiting game. I could have accepted the long wait if only I had been told.

If anything is missing, then it's someone to talk to when you go home, about the unknowns - if there was some way of getting some feedback!

Overall I must say that everything was OK, I have no complaints with anything.



### 3. What needs to happen?

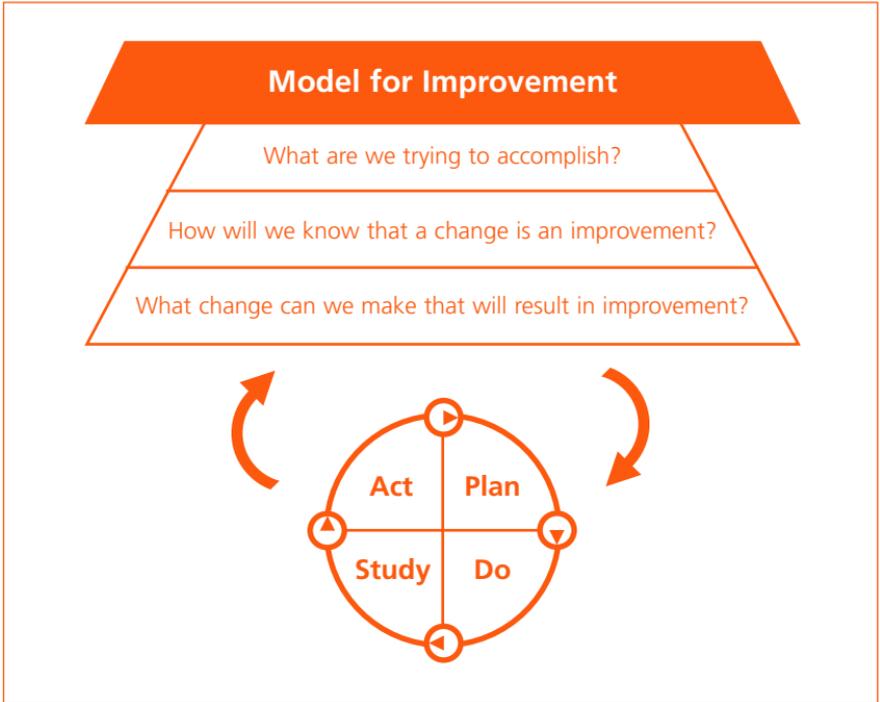
One of the perceived barriers to working across a system is the need for consensus or full agreement for any change. When there are a large number of different people, departments or organisations involved, it can feel very overwhelming. There is increasing evidence that once there is an agreement of the opportunities for improving the experience of service users, then the actual work can start without too many complicated meetings.

#### 3.1 Find out and build on what already works well

Discover the current improvement initiatives and champions supporting improvement that you already have in your system. There will most likely be excellent examples in your organisation or community. Find out what is currently happening. Your Director of Modernisation in your organisation or at your Strategic Health Authority will be able to help you.

#### 3.2 Test your ideas with the Model for Improvement

Working in systems does not necessarily mean that you need to involve large groups of people at the beginning. It may take a few attempts to get the right people together as systems are often very complex and dynamic. This, like all improvement work, is a learning process and it may be useful to start the work in smaller groups before consulting and testing with large groups. Often, just the process of seeking feedback from others outside your own department or organisation can help significantly improve the working of a system. Use the Model for Improvement as described in the Improvement Leaders' Guides: Process mapping analysis and redesign to test different ways to build relationships in your system [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)



Reference: Langley G, Nolan K, Nolan T, Norman C, Provost L, (1996), The improvement guide: a practical approach to enhancing organisational performance, Jossey Bass Publishers, San Francisco

### 3.3 Develop ways to assess success and impact across the system

Every department or organisation will have its own specific measurements to assess their performance and progress of any improvement work. It's important that these measures are shared with each other and often one department or organisation will be able to help another achieve the results they want.

At other times there may be a tension between the measures, in which case it is vital to discuss this. Use the question: 'how do we know a change is an improvement' to start the dialogue. Look at the Improvement Leaders' guide: Improving flow section 7 for ideas of system level measures of improvement [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

## 3.4 Use scenarios to test your change strategies

Scenario planning is a way to walk through or act out your idea and get feedback from participants before you implement any changes. You get a feel for whether the proposals will make real improvements, and also gain information on what might be some unintended knock-on consequences. People would then be able to feel how the new system could work.

### Case study

An Acute Trust was experiencing difficulties with long trolley waits. They had completed a number of internal process redesign projects that had contributed to a significant improvement. However, the hospital was still experiencing problems. The Operations Director decided to meet with colleagues from organisations across the whole system including Primary Care Trusts, Mental Health Trusts, social services and the local ambulance service. With colleagues from the Strategic Health Authorities modernisation group, they ran a scenario-planning day. This was a workshop where participants came from the local organisations and together they went through a number of case studies. They each acted a role in the patient process and tested real data to see what happened when they changed parts of the process. By testing in this way, they were able to better understand the impact of any proposals and they also had the opportunity to discuss any issues that arose.

An acute Trust in the Midlands

## 3.5 Develop 'simple rules' for system improvement

Often there is a feeling that everyone needs to reach a consensus about what needs to be done but this is not necessarily the case. Try developing simple rules. If everyone involved in the system can agree to a set of simple rules, and the roles and responsibilities are clear, they can each get on with quite a lot of action without having to involve others on a day to day basis.

Simple rules are fundamental specifications of what is required (must be done), prohibited (must not be done) and allowed (could be done).

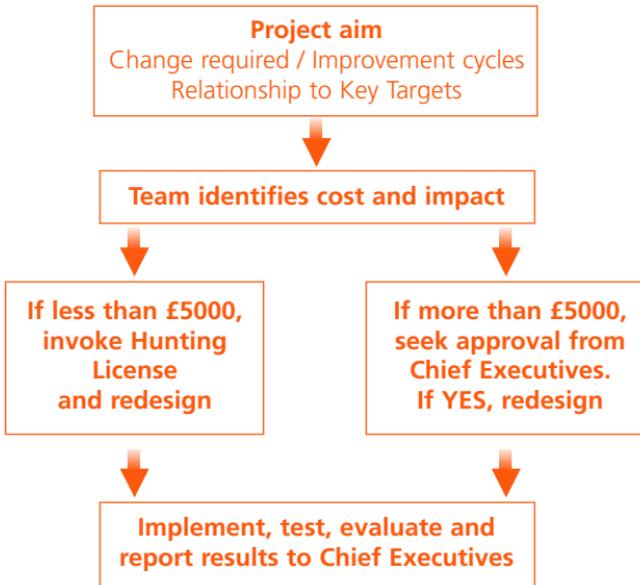
Remember all key stakeholders have to agree with the simple rules and constant communication is vital.

## Case study

### Commitment to work together for common community-wide goals in North and East Devon

A 'hunting license' concept is being used as a symbol of team working amongst Chief Executives across the health and social care community. It provides permission from one Chief Executive to allow another Chief Executive and/or individuals such as project leads, to work across organisational boundaries and make certain decisions on behalf of other organisations.

#### The 'Hunting License'



## 3.6 Find ways to share impact and learning

Spend some time working out how you will ensure the changes are having the desired impact and not having adverse knock-on effects elsewhere in the system. The Improvement Leaders' Guide: Improving flow, section 7, gives advice on strategic measures [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

Think carefully about how you will evaluate your work in order to share your achievements and learning. Look at the Improvement Leaders' Guide: Evaluating improvement [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

Remember that you will need to design different ways in order to communicate with and encourage different groups, professions or organisations. The Improvement Leaders' Guide: Managing the human dimensions of change [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides) will help you tailor your message for different audiences.

### Case Study

#### Chronic obstructive pulmonary disease (COPD) in south London

Almost a fifth of the patients attending the emergency department of South London hospital three years ago were found to be suffering respiratory problems. Average length of stay for those with chronic obstructive pulmonary disease (COPD) was 14 days, and although patients had to endure a three-month wait to be assessed for rehabilitation, only 28% ever completed the programme. So with help from Pursuing Perfection, the health and social care community, of which the hospital is part, set up a project to redesign the COPD patient's pathway through the system.

The length of stay for COPD has been reduced to 6.6 days and patients can access far more support to keep out of hospital altogether. They need to wait only two to three weeks for pulmonary rehabilitation and 70% complete the programme. The hospital has seen an 11% fall in the number of occupied bed-days attributed to COPD patients. Lessons from the project are now being applied to a range of other long-term conditions across the community, an area of 600,000 ethnically and culturally diverse people, many of them elderly and many of them poor.

## Case study

### Different systems working together to prevent falls for older people

The National Services Framework for Older People requires care communities to reduce the number of falls that result in serious injury. Each year over one third of people over 65 fall. Falls are a major reason for A&E and hospital admissions and many are due to medicines or environmental issues and may be preventable.

A simple five question assessment tool was devised by social services, district care managers, home care service, the community alarm service and them A&E department in the local Trust. It is used either face to face or over the phone and if the older person scores three or over, they are referred to a newly formed community falls team (with user consent). The falls team then carries out an overview assessment and refers on for specialist assessment as necessary.

The different systems have worked together for the benefit of older people. The model works because it:

- identifies those at risk before they go to A&E
- 'finds' cases that may not have been referred to mainstream services
- enables workers in social services to readily access multidisciplinary services and advice
- helps older people who otherwise may not be able to stay at home
- demonstrates that some falls are preventable and not a natural consequence of ageing

A South London Health and Social Care community

Working in systems is mainly about building relationships and encouraging dialogue. The Improvement Leaders' Guides have great advice about lots of different ways to get people talking and working together to make improvements. Don't forget to revisit them. Treat the advice and activities as a cupboard full of ingredients that you can select, add to and adapt in order to create the right 'recipe' to fit your needs. You are the person who knows about your organisation, your colleagues, your needs, and the needs of your users. Make the Improvement Leaders' Guides work for you

[www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)



## 4. Activities

Before organising any activity, consider the following:

- who is the audience?
- what is their prior knowledge?
- is the location and timing of the activity correct?
- recognise and value that participants will want to work and learn in different ways. Try to provide information and activities to suit all learning styles

### Why is this important?

Some of us take to the idea of change more easily than others. Some like to develop ideas through activities and discussions, while others prefer to have time to think by themselves. We are all different and need to be valued for our differences.

### Aim to create a dialogue

Keep in mind that the definition of dialogue is different from discussion. All the activities described in this and other Improvement Leaders' Guides are to encourage all the characteristics of 'dialogue'.

<b>Dialogue</b> a conversation	<b>Discussion</b> an examination by argument
starts with listening	starts with talking
is about speaking with...	is about talking to...
focuses on insights	focuses on differences
encourages reflection	encourages quick thinking

---

## 4.1 Defining your system

### Aim

- to understand the boundaries of your system and produce a working definition

**Note:** the definition may change as your learning develops

### When to use

- right at the start
- review regularly

### How to use

- use with a group to devise a joint working definition that will be understood by all those affected by your work
- keep in mind the definitions of microsystems and of systems in terms of structures, processes and patterns (section 1.3)
- be prepared to change, adapt and improve your definitions. Others may not see it as you do!

Write your definitions here	Consider
Why do I want to work across the system?	<ul style="list-style-type: none"><li>• user needs</li><li>• process or performance improvement</li><li>• financial requirements</li><li>• strategic needs</li><li>• technology development</li><li>• redesigning roles, etc.</li></ul>
What is the focus?	<ul style="list-style-type: none"><li>• geography</li><li>• disease</li><li>• population</li><li>• policy, etc.</li></ul>
What and/or who is included in my definition of the system?	<ul style="list-style-type: none"><li>• keep in mind the definitions of microsystems and of systems in terms of structures, processes and patterns (section 1.3)</li></ul>
What and/or who is not included in my definition of the system?	<ul style="list-style-type: none"><li>• be explicit</li></ul>
How can I describe the system in a few sentences?	<ul style="list-style-type: none"><li>• avoid using bullet points and write the definition in full</li><li>• use this definition as a start for all the other activities</li></ul>

## 4.2 Assessing the level of relationships

### Aims

- relationships and dialogue are vital, so use this tool to be clear about the type of relationships you currently have and to identify areas for further work

### When to use

- once you have defined all the elements, such as professions, teams, departments or organisations in your system
- review regularly

### How to use

- ask key members of your system to make comments and then bring everyone together to discuss different perceptions. The key focus is on the dialogue. There are no right answers
- see what the pattern looks like when you combine results from different perspectives
- decide possible actions

<b>The system (as defined in activity 4.1)</b>		
Level of relationship	With which departments or organisations in the system do you have this level of relationship?	Is this adequate? What do you need to do?
<b>Encounter</b> <ul style="list-style-type: none"><li>• random meetings to deal with operational necessities</li></ul>		
<b>Communication</b> <ul style="list-style-type: none"><li>• commitment to sharing information</li><li>• regular effective communication processes</li></ul>		
<b>Collaboration</b> <ul style="list-style-type: none"><li>• agreed aims and mutual benefits</li><li>• infrastructure in place for joint working</li></ul>		
<b>Improvement</b> <ul style="list-style-type: none"><li>• willingness to change behaviour for benefit of the whole</li><li>• initiatives in place to improve services</li><li>• mix of top down and bottom up approaches</li><li>• measurable improvements achieved</li></ul>		

## 4.3 Engaging the right people

### Aim

- to help you think about how you are going to engage with other people across your system: different professions, teams, departments and organisations

### When to use

- when you have defined your system and want to think about the individuals that need to be engaged and involved

### How to use

- use by yourself to help you think or use with a group to encourage dialogue and devise a joint working definition that will be understood by all those affected by your work
- be prepared to change, adapt and improve. Others may not see it as you do!

The system (as defined in activity 4.1)			
	List roles and names	Why would they want to be involved? What are the attractors?	When and how are you going to involve them?
Who are the key decision-makers and opinion leaders who will take an active role in influencing both strategy and operation?			
Who are the other key players who would prefer to be kept informed rather than take an active role?			
Who will be the key players when you get to dealing with specific issues?			
What other groups and individuals do you need to create?			

## 4.4 Assessing and improving relationships using the **S.T.A.R.** model

### Aim

- to demonstrate that relationships matter in the system
- to understand and develop relationships between individuals, departments, professions or organisations

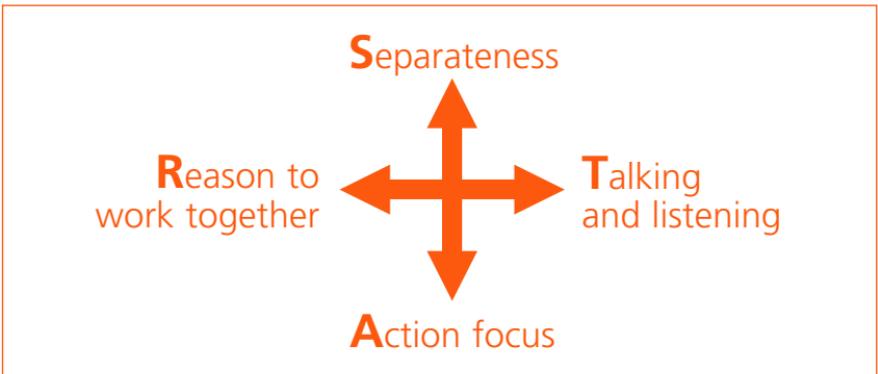
### When to use

When you have identified two elements of the system that may not be working together well, and you want to help the two groups or individuals to talk about their own relationship

### Examples

- ICU with other departments and wards within the same organisation
- A&E with local social services departments
- PCT and the housing department in local government
- your relationship with your line manager

After plotting the **S.T.A.R.**, the next stage is to help to build the relationships. You will find it useful to look at the Improvement Leaders' in the Personal and organisational development group [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)



Professor Brenda Zimmerman, McGill University

**Separateness:** is about valuing and building on different points of view, rather than being in conflict over them. Think about differences in background, skills and perspectives of the different parties:

- how different are the backgrounds, thinking patterns, and work practices of the two groups?
- how much do they value the work and contribution of the other?
- do the different parties respect these differences?

**Talking and listening:** effective relationships can only thrive when there are real opportunities to talk and listen to each other:

- how much time do people currently spend talking together and listening to what the other person is saying?
- do the different parties give permission to challenge?
- do the challenging discussions between the parties lead to constructive outcomes?

**Action focused:** the different parties need to be able to act together and create something new. This is about actually taking action, not just talking about it:

- how willing are the two to actually take action together to make improvements?
- how willing are they to actually share resources?
- where is the evidence?

**Reasons:** there has to be some mutual benefit to encourage working together which is more than just talk:

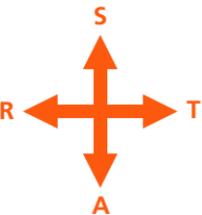
- is there a common sense of values, purpose and vision?
- when the parties disagree, do they naturally and actively go back to their common values, purpose and vision to find what they can agree upon?

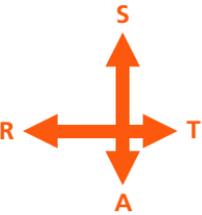
Improvement is not so much about overcoming resistance, as it is about creating attractors.

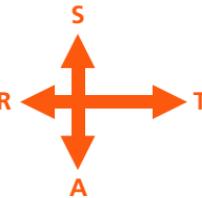
**How to use:**

Consider the relationship between the two people or groups in each of the dimensions in turn. It is best to start with considering **R**, reasons to work together, as shared values are so vital.

On drawing the relationship map if the person, department, profession or organisations have a common sense of values, purpose and vision, draw a long spike on the part of the star, if they don't then draw a small spike.

	A productive and creative relationship
--	--

	These work well together but are probably too busy to take time to talk and plan actions
--	--

	These have taken time to talk and some actions have been taken but they don't share a common purpose and work quite separately
--	--

	Lots of work required here. They have a different vision and values, do not value the contribution of the other, have made no attempt to talk and listen and therefore are not action focused
--	---

## 4.5 Confronting Stereotypes

### Aim

To recognise and acknowledge biases and differences in perceptions between key groups within the system.

### When to use

In the early stages of trying to work more effectively as a system but after you have established some levels of trust between the key parties.

### How to use

- ideally use a skilled facilitator
- bring together key players from each of the main stakeholder groups
- invite participants to move into their respective stakeholder groups  
e.g. social services, acute Trust, Primary Care Trust, transport, etc.

### Instruction to participants

- ask each to draw a picture of an animal that best represents the other groups and an animal that best represents themselves
- ask the groups to reach some consensus about why they selected each animal
- get all the groups to feed back

### Learning points

- this will highlight any stereotypes and misunderstandings
- handle the feedback with humour and ensure that some of the more extreme thinking is exposed and confronted

The system as defined in activity 4.1		
Group, profession, department or organisation	Animal that best represents it	Why that animal is selected?
	e.g. 	
		
		
		
		
		
		
		

## 4.6 Assessing the benefits

### Aim

- to recognise and acknowledge the benefits that may be realised by working in systems as experienced by each of the key partners

### When to use

- use at the start of any systems improvement initiative
- review regularly

### How to use

- work as a team to complete the benefits as best you can but recognise that it may take a few weeks
- add sectors as appropriate for your system

List all the participants or users of the system as defined in activity 4.1	Benefits for each partner
<ul style="list-style-type: none"><li>• users / patients / clients</li></ul>	
<ul style="list-style-type: none"><li>• carers / family / supporters</li></ul>	
<ul style="list-style-type: none"><li>• community</li></ul>	
<ul style="list-style-type: none"><li>• Primary Care Trust as an organisation</li></ul>	
<ul style="list-style-type: none"><li>• staff in primary care</li></ul>	
<ul style="list-style-type: none"><li>• secondary care as an organisation or specific departments</li></ul>	
<ul style="list-style-type: none"><li>• staff in secondary care generally or specific departments</li></ul>	
<ul style="list-style-type: none"><li>• social services as an organisation</li></ul>	
<ul style="list-style-type: none"><li>• staff in social services</li></ul>	
<ul style="list-style-type: none"><li>• voluntary sector as an organisation</li></ul>	
<ul style="list-style-type: none"><li>• staff in voluntary sector</li></ul>	
<ul style="list-style-type: none"><li>• other sectors / organisations / professions</li></ul>	
<ul style="list-style-type: none"><li>• staff in other sectors / organisations / professions</li></ul>	

## Case study

### Achieving greater integration of health and social care services and implement the Single Assessment Process for older people

Social services and a PCT agreed to a joint approach to meeting the milestones of the National Service Framework for Older People. There was an agreement for the redesign of health and social care services into interdisciplinary, co-located teams able to deliver integrated packages of care to better meet the needs of the population.

#### The goal

To ensure that older people receive appropriate, effective and timely responses to their health and social care needs and that professional resources are used effectively.

Following an initial meeting, a series of multidisciplinary workstreams were started including:

- consultation with residents and partner agencies
- consultation with staff and unions
- staff training and development
- access to services and pooled budgets
- policy and procedures
- hospital admissions and discharges
- information technology
- human resources
- management structures
- health and safety

After the first 18 months the key improvements include:

- integrated teams have started. This involves social services working with GP registered populations alongside district nursing teams
- staff have started to use a single integrated assessment / care record document
- a new integrated team has started to look at preventing hospital admissions
- a group of local users now meets regularly

Everyone realises how complex and ambitious the original plans were. However lots of things have happened since the joint work started and whilst much has been achieved, the new services are still at an early stage and real challenges remain to ensure it becomes a sustainable reality.

Social services and a PCT in the Midlands

## 4.7 Force field analysis

### Aim

- to gather information about what might be driving improvement
- to balance this with the opposing force which might be barriers to change.

### When to use

- do this early in your systems work
- review regularly

### How to use

- one person can do the analysis and then it can be shared, or it can be developed in a short meeting of interested parties
- check the results with a number of people, especially those you do not normally work with
- keep in mind the components of systems in terms of structures, processes and patterns and clinical microsystems (see section 1.4)

<b>The system as defined in activity 4.1</b>	
<b>Aims and objectives of the system:</b>	
<b>Driving Forces</b> 	 <b>Hindering forces</b>
<b>Next steps / Ideas:</b>	

## 4.8 SWOT Analysis

### Aim:

- to help you think about your system and all those involved as defined in activity 4.1 in terms of current strengths and weaknesses and potential opportunities and threats

### When to use:

- do this early on in your system work
- review regularly

### How to use:

- describe your system and then list the issues in each of the appropriate sectors
- keep in mind the components of systems in terms of structures, processes and patterns and clinical microsystems (see section 1)

<b>The system as defined in activity 4.1</b>	
<b>Strengths</b> characteristics, behaviours and aspects of performance that are strong	<b>Weaknesses</b> characteristics, behaviours and aspects of performance that are weak
<b>Opportunities</b> events, openings, changes that may give positive opportunities for improvement	<b>Threats</b> events or changes that could be detrimental to improvement

## Case study

### Enablement: the key to reducing health inequalities through community regeneration

Traditional approaches to the regeneration of communities with high deprivation have often created a mismatch in expectations between residents and service providers. However, the Beacon Estate in Falmouth has been a notable exception. In 1995, the community of 6,000 in 1,008 homes had reached an all time low, reflected by poor health, very high rates of crime, abuse of all types, underachievement and a loss of 'self-belief' and 'hope'. Largely abandoned by statutory agencies, Health visitor, Hazel Stuteley, and colleagues initiated the Beacon project, aimed at reversing the spiral of health and social decline. There was no funding available to kick start regeneration. The key was the identification of a small number of residents able to effectively engage their peers. Simultaneously, a series of awareness raising meetings, profiling the estate's escalating problems, resulted in the commitment of a few strategic multi-agency partners, initially local government, social services and education.

The key residents were supported in their efforts by these agencies, to facilitate engagement with other residents, and also given training in skills to run meetings to improve communication. By using a range of strategies, the numbers of residents engaged leapt from the original five to over a hundred. This large group was then encouraged to prioritise their issues for regeneration, which they chose as crime, housing and unemployment. These were, again, respected and supported by the appropriate statutory agencies, which enabled the residents to self-generate funding for widespread improvements to their homes and environment.

This resulted in a high level of community cohesion and there were many measurable and significant health outcomes by 1999 including:

- 50% reduction in all crime
- heating and insulation to over 900 homes
- 100% improvement in boys' SATS results at key stage 1
- 70% reduction in post natal depression
- unemployment down by 70%

In 2003, all of these outcomes have been sustained given normal variables. Indeed the community has grown and developed even further. Training courses are run on the estate and the citizens are encouraged to identify further training/education requirements.

There has been no need for any input by the founders since 2000: the estate is self managed by the residents. The Beacon Care Centre is a converted shop, opened in 2001 which offers a wide range of primary care services including a young peoples sexual health facility. In 2002 there were no unwanted teenage pregnancies.

"Improving public health is not about money or targets. It's about attitude and shared vision. The only resource you'll ever need is the community itself"

Hazel Stuteley, West Cornwall



## 5. Frequently asked questions

### Question

I know all this what do I do next?

### Answer

There is a difference between knowing and doing. Ask yourself:

- are the systems that you work in all perfect?
- are all those using your service really getting the best care from the system?
- in what way are you actively helping your health and social care community to share your knowledge and experience, to build a really strong team of people with a wide range of skills to support improvement?

It would be a good idea to get yourself a mentor or coach who would help to challenge and develop your thinking.

### Question

Should I focus on a pathway, or disease, or a geographic area?

### Answer

There is no easy answer to this as it depends on a number of factors.

It is for you and all your colleagues in your system to work and plan this together, but ask yourself the following questions:

- what is important for your health and social care community?
- where would you make the biggest difference to the largest number of people?
- where is there the strongest commitment from clinicians and managers across the system? It is always best to start working with people who really want to change to improve things and make it clinically meaningful

### Question

How do I get people to acknowledge that if they make a change in their part of the system, it will almost certainly have an impact somewhere else?

### Answer

Get people talking together. Everyone in health and social care will be able to tell stories about how a change in another part of the organisation had an impact on their part of the process - often a negative impact.

Help people agree that the best way to improve their services is to work together and not to blame or protect their own territory. Then help them to plan ways to make those ideas happen.

---

### Question

Some time ago we worked really hard to make improvements in our healthcare system, but when the people involved in the group went back to their own organisations, they seemed to behave in exactly the same ways as before. Is there any point in trying again?

### Answer

Yes, it's important we keep trying. Failure to follow through on commitments to working in systems may be because of:

- lack of senior support
- a failure to understand or articulate the benefits for all the organisations represented
- pressures of time
- a failure to find the right people to represent an organisational group. They need to be able to secure buy-in when they go back to their organisations

Try and find out from the people involved last time what the real problems were and try and address these in your planning. Remember it is rare that people don't believe in better systems, but it is often difficult to prioritise it over and above other things.

### Question

I am sure we have lots of individuals and teams working to make improvements in health and social care in our area. Some are part of well known initiatives and programmes but I am sure that there are a number who are isolated and unaware of others undertaking similar work. What can I do?

### Answer

Work with others in your system to support and value any existing improvement work. Find out who they are and create a network for them to exchange ideas and provide mutual support. Find out what they are doing and how you can help. You may be able to:

- offer training and coaching in improvement tools and techniques
- document areas of good practice to help sharing achievements and learning
- identify champions and support the sharing and adoption of best practice
- celebrate and reward achievements

Look at the Improvement Leaders' Guide: Leading improvement [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides) for more ideas of how to encourage and engage others in improvement

## Question

I have heard someone talking about 'pattern mapping'. What is it?

## Answer

In section 1.3 we looked at the importance of understanding structures, processes and patterns when wanting to improve the effectiveness of our systems. So far our Improvement work has generally focused a lot of attention on changing structures and redesigning processes. While this has led to some great improvements in the organisation and delivery of care, we need to do more.

We need to recognise the importance of patterns that drive thinking and behaviour. By patterns we mean values, trust, and how various groups behave and communicate with one another. Often, the failure to achieve fundamental change through re-organisations and process improvement lies in the fact that the underlying patterns in the system remain unchanged.

Pattern mapping uses techniques that enable groups of stakeholders to recognise and describe patterns of behaviour within a given system and to work jointly on ways to influence these to support transformation. This methodology is currently being field tested with NHS Pursuing Perfection sites. Pattern mapping focuses on five key patterns within the culture of organisations that often strongly influence their ability to bring about whole-system transformation.

**Relationships:** do the interactions among the various parts of the system generate energy and innovative ideas for change, or do they drain the organisation?

**Decision-making:** are decisions about change made rapidly and by the people with the most knowledge of the issue, or is change bogged down in hierarchy and position-authority?

**Power:** do individuals and groups acquire and exercise power in positive, constructive ways toward a collective purpose, or is power coveted and used mainly for self-interest and self-preservation?

**Conflict:** are conflicts and differences of opinion seen as opportunities to discover new ways of working, or are they seen as negative and destructive?

**Learning:** is the system naturally curious and eager to learn more about itself and what might be better, or is new thinking viewed mainly as potentially risky and threatening to the status quo?

## Case study

### Ophthalmology department SE England

#### Background

This was a department 'in crisis' with a poor opinion of staff from outside and little sense of team spirit. There was friction between clinicians and management: a 'them and us' attitude, no engagement in making improvements and no chance of achieving performance targets.

#### Mapping patterns of relationships between clinicians and managers

Pattern mapping got long-term frustrations, anger and feelings of disempowerment out in the open. The Chief Executive accepted feedback and took decisions to address the key issues. Ophthalmology staff felt listened to and empowered to make changes.

#### Impact

Changes in structures and processes included new management located on site and a redesign of care pathways. Changes in patterns of behaviour included better team working, a 'can do' approach to solving problems and a greater focus on patients.

These changes resulted in the cataract waiting list being reduced from 15 months in December 2003 to three months in August 2004.

### Question

When is the right time to get a large group together to work through our system problems?

### Answer

Think about this very carefully. We often under-estimate the impact of 'tribalism' in health services. Quite often people attempting to work in a systems way will bring different 'tribes' together too soon to try and force the pace. It is really important for all the stakeholders to be given the time to work through their anxiety in a safe space. It is only possible to put different tribes into a room when enough people have moved from resistance into exploration. No creative work is going to take place if a critical mass is still trying to protect territory or existing positions. So be careful about bringing large groups together without adequate groundwork and preparation.

### Question

Where can I find out more about systems and systems improvement in health and social care on the internet?

### Answer

It really depends on what you are looking for. For general work about systems just type in the word 'systems', 'microsystems' or 'complexity' into a search engine on the internet and you will find many!

For great examples of work in the NHS:

- [www.institute.nhs.uk](http://www.institute.nhs.uk)
- Integrated Care Network [www.integratedcarenetwork.gov.uk](http://www.integratedcarenetwork.gov.uk)
- Trent Improvement Network [www.tin.nhs.uk](http://www.tin.nhs.uk)
- The Learning Alliance [www.nyx.org.uk](http://www.nyx.org.uk)
- London Learning Partnership [www.londonlearningpartnership.co.uk](http://www.londonlearningpartnership.co.uk)

The Improvement Leaders' Guides have been organised into three groups:

**General improvement skills**

**Process and systems thinking**

**Personal and organisational development**

Each group of guides will give you a range of ideas, tools and techniques for you to choose according to what is best for you, your patients and your organisation. However, they have been designed to be complementary and will be most effective if used collectively, giving you a set of principles for creating the best conditions for improvement in health and social care.

The development of this guide for Improvement Leaders has been a truly collaborative process. We would like to thank everyone who has contributed by sharing their experiences, knowledge and case studies.

#### Design Team

Vivienne Broadhurst, Peter Dick, Gill Dolan, Caroline Dove, Barbara Edmonds, Helen Falcon, Sarah Fraser, Ian Gotton, Kerry Gilmour, Cathy Green, Angela Jeffrey, Kam Kalirai, Gill Kelly, Val Jones, Amanda Layton, Lynne Maher, Mike McBride, Simit Naik, Jean Penny, Hugh Rogers, Neil Riley, Annabel Scarfe, Hazel Stuteley, Valerie Swaby, Gary Thompson. Also all participants of the Pursuing Perfection Programme.

To download the PDFs of the guides go to [www.institute.nhs.uk/improvementguides](http://www.institute.nhs.uk/improvementguides)

We have taken all reasonable steps to identify the sources of information and ideas. If you feel that anything is wrong or would like to make comments please contact us at [improvementleadersguides@institute.nhs.uk](mailto:improvementleadersguides@institute.nhs.uk)

The mission of the NHS Institute for Innovation and Improvement is to support the NHS and its workforce in accelerating the delivery of world-class health and healthcare for patients and public by encouraging innovation and developing capability at the frontline.

NHS Institute for Innovation and Improvement  
University of Warwick Campus  
Coventry  
CV4 7AL

Tel: 0800 555 550  
Email: [enquiries@institute.nhs.uk](mailto:enquiries@institute.nhs.uk)

[www.institute.nhs.uk](http://www.institute.nhs.uk)

Gateway ref: 5667

NHSI 0391 N CI/Improvement Leaders' Guides can also be made available on request in braille, on audio-cassette tape, or on disc and in large print.

If you require further copies, quote  
*NHSI 0391 N CI/Improvement Leaders' Guides*

and contact:

Prolog Phase 3  
Bureau Services  
Sherwood Business Park  
Annesley  
Nottingham  
NG15 0YU  
Tel: 0870 066 2071  
Fax: 01623 724 524  
Email: [institute@prolog.uk.com](mailto:institute@prolog.uk.com)

NHSI 0391 N CI  
270955

© **NHS Institute for Innovation and  
Improvement 2005**  
All Rights Reserved