NHS Greater Glasgow and Clyde

Neurology Services

3 Year Plan

2011 – 2014

Contents

Author	Jennifer Haynes
Approved By	Jonathan Best
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1. Executive Summary

This plan is intended for all those with an interest in acute neurology services in NHS Greater Glasgow and Clyde and was produced following a regional event in March 2011 which provided the opportunity to complete a SWOT and PESTLE analysis (see Appendix 1). The plan evidences current demographics of the Health Board, the rise in referrals the service has experienced in recent years and the current position in terms of both inpatient admissions and outpatient referrals. Staffing profiles have also been included. The self assessment results for the NHS HIS Neurological Standards summarise where NHS GGC meets, does not meet, or partially meets each standard. This gives an indication of where the service is doing well and where it can improve. In addition, the results from a national benchmarking exercise shows that acute neurology in NHS GGC compares favourably against readmission rates and average length of stay, but does less well in terms of depth of coding and DNA rates.

Based on the information collected and drivers from national, regional and local levels, 4 key goals and objectives were identified: quality; efficiency and equity; patient, staff and referrer feedback; and communication. Tasks to achieve these goals have been incorporated into an action plan (see Appendix 2).

2. Introduction

This 3 year plan for neurology services in NHS Greater Glasgow and Clyde has been produced in order to provide a clear indication of the direction of travel for building on the current service to make improvements. It was developed following a regional event where SWOT and PESTLE analyses were undertaken as a tool to help review the current service (Appendix 1). This exercise was completed by a multidisciplinary group, including representatives from the Neurological Alliance of Scotland, and facilitated identification of current gaps and desired changes. It also gave an indication of what is what is needed in the future to make achievements and move the service forward.

The plan has been written under the remit of the local improvement group for the NHS Healthcare Improvement Scotland's Clinical Standards for Neurological Services and was shared with the Neurological Alliance of Scotland. The final plan was approved by the Director of Regional Services who is the Chair of the West of Scotland Neurosciences Group. The improvement group and West of Scotland Neurosciences Group will monitor progress.

The contents of this plan consider the current position, including activity, targets, clinical governance and improvement programmes, and the objectives and priorities. Solutions and

implementation of change will then be considered, concluding with detail of how improvements will be monitored and sustained.

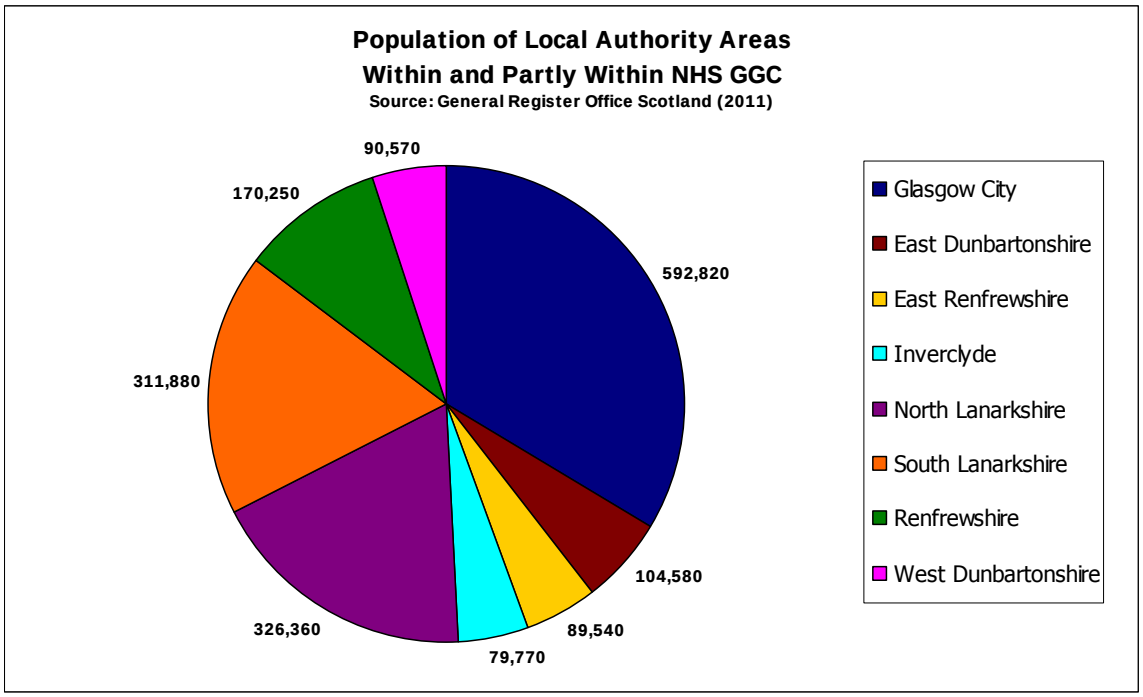
3. Scope

This initial 3 year plan is for acute neurology services which are managed by the Regional Services Directorate in NHS GGC. Whilst this service provides neurological care to the West of Scotland via a hub and spoke model, plans for the other health board areas will be submitted separately by the relevant Health Boards and are therefore out with the scope of this plan. A regional 3 year plan will also be developed.

4. Context

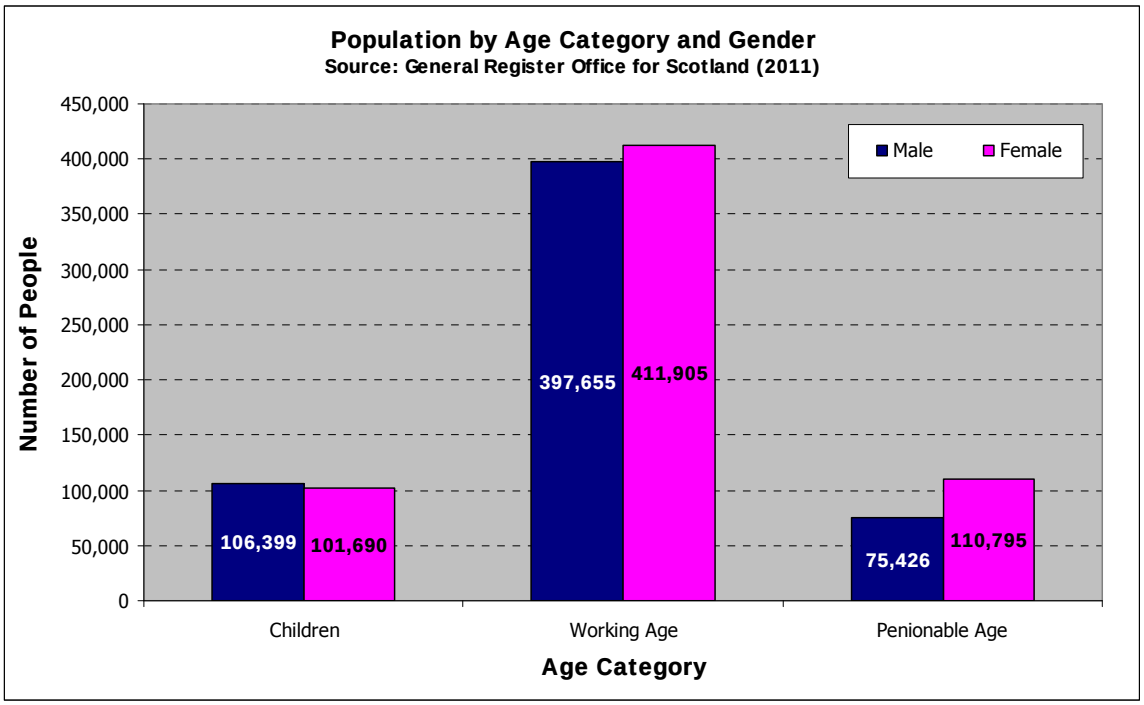
4.1 Demographics and Epidemiology

NHS GGC covers an area of 452.3 square miles in West Central Scotland and serves a population of 1,203,870 (General Register Office Scotland, 2011). The graph below shows how the population is dispersed across the Health Board area:



The average density of persons per square mile in Scotland is 67. Within the boundaries of NHS GGC, this figure is 1,046 meaning that this geographical area is more densely populated than other Health Boards within Scotland (General Register Office Scotland, 2011). NHS GGC has few rural areas with the majority of residents living in urban settings.

The estimated population of NHS Greater Glasgow and Clyde is 48% male and 52% female. The breakdown of this and age distribution is illustrated in the graph below:



All 10 of the most deprived areas in Scotland are within the boundaries of NHS GGC (Scottish Government, 2010). In terms of health, this means a higher than average level of ill health and/or mortality. Additionally, healthy life expectancy – years of life without limiting long term illness (Hanlon *et al,* 2006) – is significantly less likely in NHS GGC than it is in other Health Board areas (ISD Scotland, 2008).

Regarding epidemiology of common neurological conditions, the below table demonstrates approximate incidence and therefore calculated estimate for prevalence in NHS Greater Glasgow and Clyde:

Condition	Estimated Incidence	Calculated Estimated Prevalence in GGC	Source
Alzheimer's Disease / Dementia		20,831	Alzheimer's Scotland (2009)
Epilepsy	0.7% of the Scottish population	8427	Scottish Public Health Observatory (2011)
Headache		116,880 (migraine)	Steiner *et al* (2003)
Motor Neuron Disease	7 per 100,000 (UK)	84	MND Association (2011)
Multiple Sclerosis	190 per 100,000 (Scotland)	2287	MS Trust
Myasthenia Gravis	1 per 100,000 (UK)	12	Myasthenia Gravis Association
Parkinson's Disease	1 per 500 (UK)	2407	Parkinson's UK
Peripheral Neuropathy	1 per 50 (England)	24,077	NHS Choices
Stroke	165 per 100,000 (Scotland)	1986	ISD Scotland (2011)

4.2 Current Service Assessment

a. Location

The Neurology Service in NHS Greater Glasgow and Clyde Health Board provides specialist assessment and treatment to adolescents and adults with neurological disorders.

Outpatient clinics are delivered in several hospitals in NHS Greater Glasgow and Clyde:

- Southern General Hospital
- Glasgow Royal Infirmary
- Western Infirmary, Glasgow
- Royal Alexandra Hospital, Paisley
- Vale of Leven Hospital, Alexandria
- Inverclyde Royal Hospital, Greenock

In addition, outpatient clinics are delivered in NHS Ayrshire and Arran and NHS Lanarkshire by NHS GGC Consultants as part of the West of Scotland neurological service model.

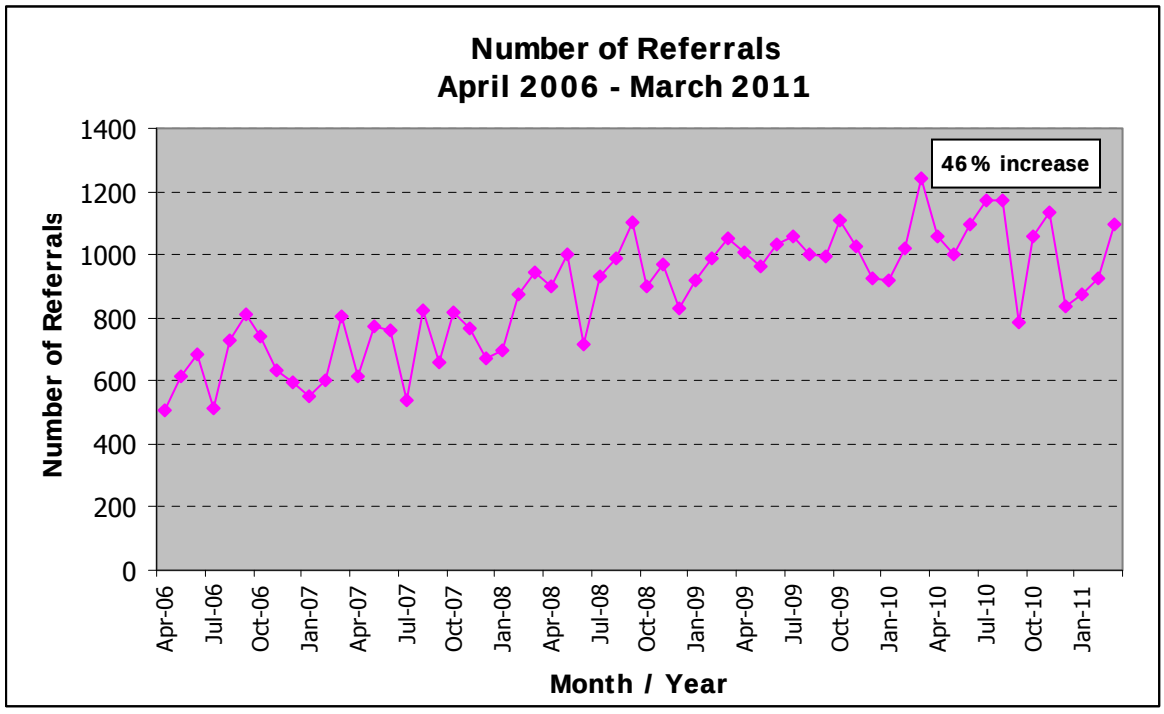
Dedicated acute neurology in patient, short stay and day case facilities are based at the Institute of Neurological Sciences, Southern General Hospital, Glasgow.

b. Service Provision

The service offers general neurology clinics as well as sub speciality clinics for a range of neurological conditions. These are delivered by Consultant Neurologists, GPs with Special Interest, junior doctors, nurse specialists and AHP colleagues. In addition the service has access to neuropsychiatry and neuropsychology, as well as good links to a range of other disciplines, including respiratory medicine, gastrostomy, palliative care and medicine for the elderly. The neurology service also has links to neuroradiology and neuropathology.

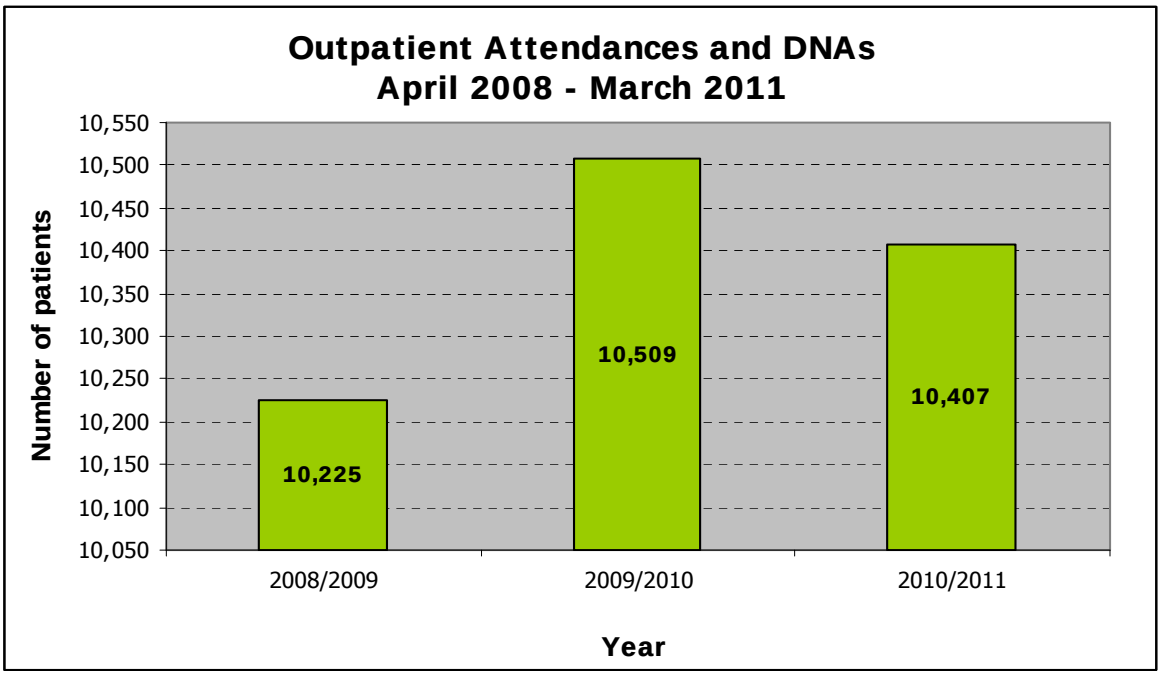
c. Activity

The Neurology Service in NHS GGC has experienced a rapid growth in the number of referrals received in recent years. The rate of growth is illustrated in the table below.

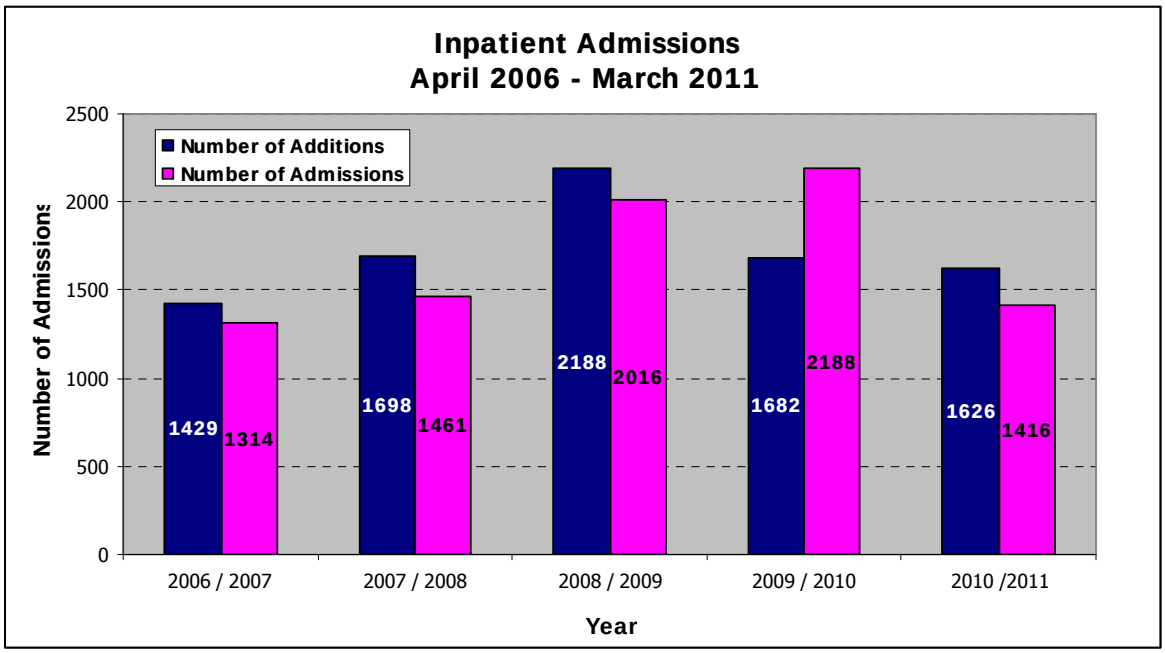


The increase in referrals has had a corresponding impact on waiting list, putting pressure on the service to meet a growing demand. A Demand, Capacity, Activity and Queue (DCAQ) exercise was completed in order to assess the affect an increased referral rate was having on the ability of the service to deliver.

Outpatient figures for 2010 / 2011 are shown in the table below:



Inpatient figures have not grown at the same rate, showing that although there has been an increase in outpatient referrals, the number of patients being added to the inpatient waiting list has not risen correspondingly. The number of additions to the inpatient waiting list between April 2006 and March 2011 is illustrated in the graph below.



e. Staffing Profile

Staff Group	Number / WTE
Medical	19 Consultant Neurologists
	2 Clinical Academic Consultants
	9 Specialist Registrars (variable)
	2 GPs with Special Interest
Nursing	1 WTE Lead Nurse
	14 Clinical Nurse Specialists
	2 WTE Band 6
	23.12 WTE Band 5
	8.09 WTE Band 2
Administration and Clerical	18.47 WTE Medical Secretaries
	2.33 WTE Ward Clerks

AHP staff are managed by a different Directorate and have therefore not been included in the above table.

f. Clinical Governance

The NHS GGC neurology service has local reporting arrangements in place which are overseen by the Institute of Neurosciences and Spinal Injuries Clinical Governance Group and in turn by the Regional Services Division Clinical Governance Group.

In June 2011, the Regional Services Directorate reported that:

- Hand Hygiene: Neurosciences (including Neurosurgery and OMFS)achieved a 96% monthly average compliance
- SPSP: All neurology wards are currently collecting data for the SPSP general work stream
- Complaints: 4 complaints were received for neurology all of which achieved the response target of 20 days
- Key Clinical Indicators: Neurosciences (including Neurosurgery and OMFS) achieved a 98% monthly average compliance
- Putting People First: Neurology currently has 3 active projects for involving patients and carers in services

g. Healthcare Improvement Scotland – Neurology Clinical Standards

Healthcare Improvement Scotland (formally Quality Improvement Scotland) developed a set of clinical standards for both general and condition specific neurological illnesses. These standards form the basis of a 2 year improvement programme for Boards to enhance current services. A

self assessment against general neurology standards was completed in July 2010. The results of this are shown in the table below:

Standard	Met	Partially Met	Not Met	Further Clarity Needed	TOTAL
1. General neurological health services provision	1	2	1	2	6
2. Access to neurological health services	4	0	4	0	8
3. Patient encounters in neurological health services	12	2	3	0	17
4. Management processes in neurological health services	11	4	1	0	16
TOTAL	**28 (60%)**	**8 (17%)**	**9 (19%)**	**2 (4%)**	**47 (100%)**

The same exercise was completed for Condition Specific Standards and the results of this are displayed in the table below:

Standard	Met	Partially Met	Not Met	TOTAL
Epilepsy	6	1	2	9
Headache	10	0	0	10
Motor Neurone Disease	12	3	0	15
Multiple Sclerosis	13	0	0	13
Parkinson's Disease	8	1	1	10
TOTAL	**49 (86%)**	**5 (9%)**	**3 (5%)**	**57 (100%)**

Work has been ongoing since August 2010 to achieve standards that are currently not, or partially, met. This has been assisted by an allocation of funding from the Scottish Government to achieve standards. A progress report submitted to NHS HIS in April 2011 highlighted the work done to date and received positive feedback. This improvement programme finishes in March 2012.

4.3 Benchmarking

The Neurology Service in NHS GGC participated in a national benchmarking exercise to assess this service with other neurological centres throughout the UK for the year 2009/2010. Of 18 centres that were included in the exercise, NHS GGC was the third largest (in terms of number of patients). The table below illustrates some of the key comparisons.

Activity	Average for all Centres	NHS GGC
Depth of Coding (diagnosis per episode)	2.8	1.6
Readmission rate	3.5%	2.7%
Outpatient follow-up trend (N:R ratio)	2.3	1.5
DNA rate	New: 11% Return: 13%	New: 16% Return: 19%
Day case practice – all elective activity	77%	61%
Elective inpatient average length of stay (bed days)	7.15	2.7

(Please note that some day cases in England are undertaken in outpatients in NHS Greater Glasgow and Clyde).

The results of this benchmarking exercise are used as a tool on which to measure performance and to form the basis of plans to improve.

4. Service Objectives and Priorities

4.1 Goals, Objectives and Drivers

The goals and objectives of the service in the next 3 years are:

Goal / Objective	Driver
1. To deliver a quality service that gives confidence to patient, referrer and provider	• NHS HIS Neurological Clinical Standards • 18 weeks RTT • NHS Scotland Quality Strategy • The Scottish Patient Safety Programme • Leading Better Care
2. To manage our resources effectively to ensure efficiency and equity	• 18 weeks RTT • NHS HIS Neurological Clinical Standards • Local Priorities. For example: o Reduction of DNA rates o Achieving waiting times targets
3. To implement systems to gather and act on patient, staff and referrer feedback	• Better Together • NHS Scotland Quality Strategy • NHS HIS Neurological Clinical Standards • Complaint responses and action plans • Results of patient feedback surveys
4. To develop communication systems to engage with all key stakeholders	• NHS HIS Neurological Clinical Standards • NHS Scotland Quality Strategy

4.2 Solutions

Whilst there is a continuing financial pressure on all NHS services, improvement tools, such as lean methodology, process mapping, audit results and so on, have been adopted to improve the service without increased resources.

5. Implementation

5.1 Action Plan

An action plan has been developed which shows the tasks associated with each goal and objective (see Appendix 2).

5.2 Risk Management

A risk register has been developed in conjunction with the action plan (see Appendix 3).

6. Performance Management

Work on achieving actions identified in this plan will be overseen by the NHS HIS Neurological Standards Improvement Group and the West of Scotland Neurosciences Group. A working copy of the action plan will be maintained, updated and distributed to these groups to provide quarterly progress reports. Regular updates will also be provided to the Directorate's Clinical Governance Forum and the Long Term Conditions Steering Group.

Appendix 1: PESTLE and SWOT Analysis

P.E.S.T.L.E

Political

- NHS governed by Scottish Government
- Strategy and policies of Scottish Government
- Funding in NHS Scotland differs to rest of UK
- Shifting the Balance of Care (delivering care more locally)
- Conflict with different stakeholders
    - Different perspectives / agendas
        - National Vs local
        - Within and out with the NHS Board/s
- Access targets
- QIS standards
- NHS Greater Glasgow and Clyde – relationship between Board and City Council and restructure of CHPs
- CHP single outcome agreement
- 18 week RTT
- HEAT targets
- Focus on voluntary organisations becoming meaningful partners
- Competition
- New Southern General Hospital
- Changes to benefits system
- Direct payments
- Adult Support Protection Act
- Discrimination Act
- Patient rights (and expectations)

Economic

- Difficult financial climate
- Scottish Government Change Fund (reshaping care for older people)
- CRES – bottom line
- Tension of having fewer resources
- What we're doing with the money we've got
- Opportunity to be innovative / creative / clever with the resources we do have
- Encourages identification of best practice to learn from other areas/Boards
- Priorities change when money is limited
- A need to be careful that lack of money isn't used as an excuse for not delivering
- Sometimes you need to 'speculate to accumulate'
- The risk that short term savings are made without considering the bigger picture
- Money from Long Term Conditions unit at the Scottish Government to support the QIS Standards
- Review of vacancies
- Redeployment / redundancy packages and who will they be available to
- Agenda for Change bill
- Fuel bill increases
- Bigger emphasis on working with voluntary organisations
- Less money available to voluntary organisations (significant drop in donations from both local government and privately)

- Benefits
- New Southern General Hospital
- Cost of MS drugs
- Cost of NHS property
- No funding to develop services
- Knock on effect on peripheral services
- Creeping developments where no allocated funding is available
- Procurement
- Changes to pension law
- Bed numbers
    - Using efficiently
    - Ways of counting on hospital systems

Social

- Epidemiology
- Ageing population (patients and carers)
- Deprivation
- Geography / postcodes
- Coming together in tough times
- Low morale and motivation
- Board restructures
- Uncertainty
- Fear of redundancy – "where is the axe going to fall"
- Increasing workload that's not recognised
- Stretched services
- A need to justify position / job
- A wish to deliver the best possible care
- Patients not getting all the possible benefits from service delivery
- Burden on carers
- Pressure from all areas
- Decisions made at a high level without realising the impact on the ground
- Increased expectations from patients and staff
- Patients more educated in their symptoms (dependent on age and economic status)
- Personality of individual clinicians
- Increasing unemployment rate
- Knock on effect of isolation which can lead to mental ill health
- Community / volunteers

Technological

- SCI referral system
- PMS / Track care roll out
- Clinical Portal (NHS GG&C)
- 'Ensemble' from Scottish Government
- Lack of IT systems 'speaking' to one another:
    - Between GP, Hospitals and Social Services
    - Creates inefficiencies such as repeating diagnostic tests
    - Reluctance to share information across Boards
- Accuracy of data inputted into patient information systems – vulnerable to human error
- Access to hospital information systems at clinician's homes for out of hours
- Different services using different systems
- Electronic patient record
- Tele-health care
- Advancements in drugs / treatments
- New scanning techniques

- Changes to social care service delivery
- Increasing reliance of technology (at risk of not actually listening to the patient?)
- Administration add on's – e.g. digital dictation with voice recognition
- Increased efficiency
- Communication aids

Legal

- Patients' Rights Bill
- Quality Strategy
- Quality led – risk assessed?
- EU legislation
- Health and Safety – positive and negative
- Employment law
- Confidentiality / data protection
- Adults with incapacity and mental health acts
- Power of attorney
- Complaints procedure
- Clinical advice
- Referral management
- Quality versus quantity of service delivery
- Patient expectations
- Palliative care

Environmental

- Access for those in rural areas
- Centralised service
- New Southern General Hospital
    - Parking
    - Transport (poor links for patients and staff)
- Patient transport system
- Climate change
- Adverse weather conditions

S.W.O.T

STRENGTHS

- Regional approach (small Boards not working in isolation)
- Sub specialties
- Links between NHS (acute and primary care) and voluntary organisations
- Multidisciplinary approach: nurse specialists, AHP, GP with special interest; psychiatry/psychology; etc
- Training / skill base / experience of existing staff
- Neurological Alliance – voices programme
- Commitment to improvement
- Good interventions
- Southern General Hospital (reputation, Glasgow Coma Scale, sub specialty model and linked services)
- Strong and highly regarded neurology services in Scotland
- Good cooperation between health care staff
- Douglas Grant rehab service
- Development of new services

WEAKNESSES

- IT systems don't link (both within and between Boards)
- Managing patients with unexplained symptoms
    - Not built into the system
    - Demand on resources
- Carer support
- Move between health and social care
- Southern General Hospital – at a cost to peripheral services?
- Not working across city boundaries
- Lack of awareness of what each service provides
- Rate and scale of change
- Too much red tape
- Scrutiny from Scottish Government
    - Short term funding schemes with limited consideration of sustainability
- Gaps in service delivery
- Patients not necessarily at the centre
- Unclear patient pathways
- Uncertainty of where to refer to
- Difficult to capture a true picture of what we've got
- Delays in patient journey
- Geographical inconsistencies

OPPORTUNITIES

- QIS standards
- National focus on medically unexplained symptoms
- Neurology Voices programme
- Move between health and social care
- Training – patients and staff
- Self management
- New CHP structure (NHS GG&C)
- Things can only get better!
- Delivering health locally
- Enabling and influencing services
- Chronic disease management
- Using current context to our advantage
- Put patient at the centre
- Improve advice to referrers
- Increase awareness of neurological conditions
- Actively involve all stakeholders
- Voluntary organisations have patient reps trained to participate now
- Re-design

THREATS

- Increasing demand
- Sustainability
- Uncertainty
- Morale
- Social care infrastructure and impact on people's health and well being
- Delayed discharges
- Staff learning
- Managing change and expectations
- Number of QIS standards
- Conditions not included in QIS standards
- Management
- Service cuts
- Demography change
- Increasing sub specialization
- 'Generic specialist'
- Review of vacancies
- Quick fixes
- Less research and development
- Demand Vs capacity
- Ego / attitude
- Over consultation but no action
- Discrimination
- Not utilizing patient experience
- Not opening up to everyone
- Concentrating on the QIS standards and missing the bigger picture

Appendix 2: Action Plan

SERVICE OBJECTIVE	TASK	TIMESCALE	OUTCOME MEASURE	PERSON ACCOUNTABLE
Deliver a quality service that gives confidence to patient, referrer and provider	Ensure that the service provides accurate and current information to all patients through the development of a website	Dec 2011	Launch website which is approved by a range of professions, patients and voluntary organisations before going live	Saif Razvi / Jennifer Haynes
	Work towards patient pathways being efficient and integrated (including neuropsychology / neuropsychiatry)	August 2012	Map current pathways to identify and alleviate gaps	Improvement Group
	Ensure efficient turnaround of discharge information (e.g. letters) to both patients and referrers		Identify resource and process needed to allow this to happen and audit when in place	
	Work towards achieving all NHS HIS Neurological Clinical Standards	March 2012	Review local NHS HIS standard action plan and prepare for peer review	Susan Walker / Jennifer Haynes
	Explore possibility of improved IT systems and link to Trak Care roll out	December 2012	Trak care implementation	
	Review and implement relevant new guidance (for example, SUDEP, SIGN, NICE)	Ongoing	The service ensures all new guidance is implemented appropriately and adhered to	Dependent on guidance
Manage our service effectively to ensure efficiency and equity of access	Achieve and sustain local / national access times targets through substantive resources	Ongoing	Ongoing review of waiting lists to identify and manage pressures	Susan Walker / Kirsty Forsyth
	Reduce and sustain DNA rate across all outpatient clinics	Ongoing	Measure success against target rate of 4%	Karen Parker / Jennifer Haynes
	Review DCAQ exercise to identify gaps and develop a plan to address these	December 2011	Dependent on what gaps are identified	Susan Walker / Kirsty Forsyth / Karen Parker

SERVICE OBJECTIVE	TASK	TIMESCALE	OUTCOME MEASURE	PERSON ACCOUNTABLE
	Consider opportunities for redesign (service/skill mix/ processes)	March 2012	Adopt tools such as process mapping and lean methodology to consider current position and identify potential changes for improvement	Gina Clark / Jennifer Haynes
	Ensure patients are transferred back to the referring unit an acceptable time period	On going	Verify and evidence through audit that this happens in a timely fashion	Jennifer Haynes / ward colleagues
Implement systems to gather and act on patient, staff and referrer feedback	Complete on going surveys, record results and develop a system for acting on feedback	Ongoing	Regularly review whether action has been taken in light of comments	Jennifer Haynes
	Strengthen and maintain links with the Neurological Alliance of Scotland	Ongoing	Ensure regular meetings and use input to shape discussion on services and take part in Neurological Voices programme	Susan Walker / Jennifer Haynes
	Learn from complaints by submitting and acting on action plans	Ongoing	Audit to ascertain whether actions from complaints are carried out	Jennifer Haynes
Develop communication processes to engage with all key stakeholders	Expand and strengthen the neurology improvement network	March 2012	Map the network to show links and contacts	Jennifer Haynes
	Work collaboratively with the Neurological Alliance of Scotland, other patient support groups and charities	Ongoing	Ensure regular meetings and use input to shape discussion on services	Susan Walker/ Jennifer Haynes
	Develop channels of communication with long term conditions and CHPs	March 2012	Work with CHP colleagues to map relevant services and designations	Susan Walker/ Jennifer Haynes

Appendix 3: Risk Register

Assumption	Description of risk	Likelihood	Actions to overcome
Not all NHS HIS standards are met	The Board is unsuccessful in meeting standards it currently does not or partially meets	Medium	Efforts will be made to ensure achievement of standards recognised as a priority by NHS HIS and NHS GGC
A fact finding exercise shows that it is not possible to implement improved IT systems	Improved IT systems must be implemented across acute services and cannot be achieved in isolation	Medium	The service will keep abreast of all developments and consider taking part in pilots where appropriate
The service faces significant challenges in achieving waiting time targets	The service cannot achieve waiting list targets without resorting to waiting list initiatives or other temporary solutions	High	Use the review of the DCAQ exercise to evidence the substantial increase in referrals, shortfall and the need for additional capacity
The target DNA rate of 4% is not achieved	The service's efforts to reduce the DNA rate do not achieve 4%	High	The service will implement plans to reduce the DNA rate as much as is possible locally and keep abreast of developments, such as text reminders to patients
Patients are not transferred back to the referring unit in a timely fashion	Referring units cannot accommodate patients upon transfer request and hence patients remain in an acute neurology ward for longer than necessary and/or there are delays in patient transport	High	Regular audit of delayed discharges
The service cannot map relevant services across the Health Board	Due to the size of NHS GGC, the service struggles to identify services and designations across the Board area	Low	The service will develop the improvement network and ask colleagues in different parts of the service to assist in this task

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