Royal Devon University Healthcare NHS Foundation Trust

JOB DESCRIPTION

JOB DETAILS	
Job Title	Clinical Scientist - Genomics
Reports to	Principal Clinical Scientist Team Lead
Band	Band 7
Department/Directorate	Genomic Laboratory/Specialist Services

JOB PURPOSE

Through the reconfiguration of Genomic Laboratory service provision in England, the NHS will provide Genomic testing through a single national testing network, consolidating and enhancing the existing laboratory provision. This will create a world-class resource for the NHS, underpin the future Genomic Medicine Service and support delivery of the Government's Life Sciences Strategy and broader research and innovation agenda, building upon the NHS contribution to the 100,000 Genomes Project. The South West Genomic Laboratory Hub (SWGLH) is a partnership arrangement between the Royal Devon University Healthcare NHS Foundation Trust and the North Bristol NHS Trust.

The post-holder will be expected to employ all the competencies required of a Health and Care Professions Council (HCPC) registered Clinical Scientist to diagnose genetic disease, continuously developing their clinical, scientific and technical practice to provide clinical liaison with a high level of scientific knowledge, skill and expertise. The responsibilities of the post will be discharged by working closely with other members of a team to ensure the provision of accurate, timely and high quality molecular genetic services for a range of inherited genetic disorders. Clinical Scientists of this grade are personally responsible for their own work, working with a high degree of autonomy, subject to the supervision and direction of the Principal Clinical Scientist Team Lead.

KEY RESULT AREAS/PRINCIPAL DUTIES AND RESPONSIBILITIES

- Work autonomously as part of the scientific team within professional guidelines, supporting the Head of Department in providing a high standard of laboratory service.
- Provide advice to clinicians and other healthcare professionals regarding availability and appropriate use of genetic testing.
- Ensure appropriateness and prioritisation of patient test referrals, based on specimen and information provided to ensure timely reporting of clinically urgent tests.
- Use and critically appraise relevant sources of information to aid interpretation of patient test results.
- Participate in all aspects of the delivery of the clinical laboratory service, including data analysis, interpretation and reporting of test results.
- Responsible for the checking and interpretation of results, and preparation and authorisation of reports, in order to provide an efficient and accurate service to users.
- Continuously develop clinical, scientific and technical practice to provide clinical liaison with a high level of scientific knowledge, skill and expertise.
- Responsible for writing, updating and communicating Standard Operating Procedures relating to relating to procedures and processes involving the use of bioinformatics for diagnostic purposes.
- Responsible for rigorous record-keeping and strict adherence to quality standards, guidelines and policies.
- Provide specialist training to own or other disciplines, providing supervision where required and appropriate.
- Contribute to the design and implementation of innovative research and development activities to improve the efficiency of existing diagnostic tests and set up new diagnostic services.

KEY WORKING RELATIONSHIPS

Areas of Responsibility: Clinical Scientists of this grade are personally responsible for their own work, working with a high degree of autonomy, subject to the supervision and direction of the Principal

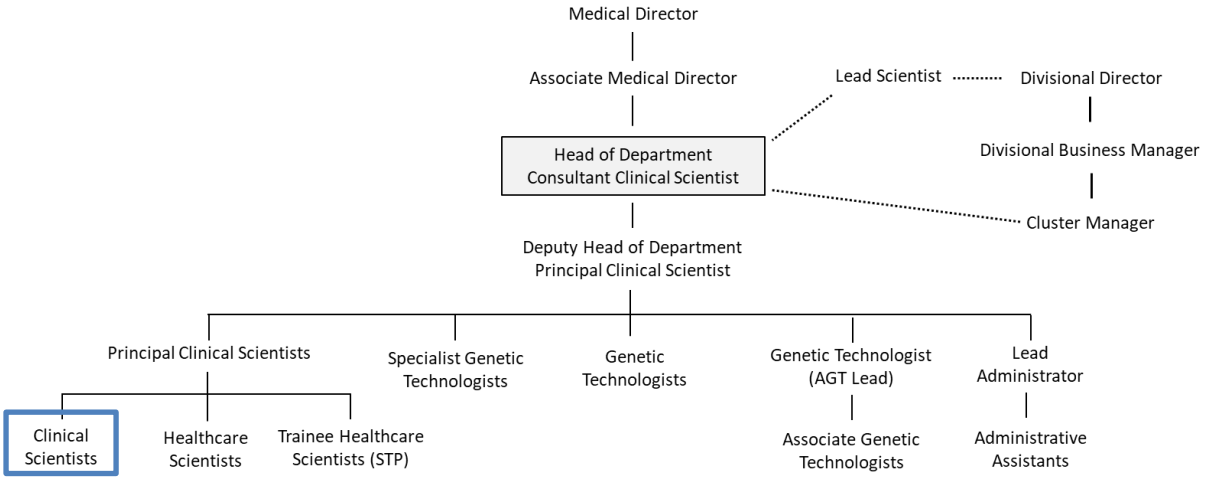
Clinical Scientist Team Lead. The post holder is required to deal effectively with staff of all levels throughout the Trust and externally as and when they encounter on a day to day basis. This will include verbal, written and electronic media.

No. of Staff reporting to this role: None

Of particular importance are working relationships with:

Internal to the Trust	External to the Trust
• Clinical Scientists • Healthcare Scientists • Bioinformaticians • Trainee Healthcare Scientists • Genetic Technologists • Associate Genetic Technologists • Administrative Assistants • Medical Staff • Other Healthcare professionals • Clinical research team members, Fellows and nurses	• Clinical Scientists • Healthcare Scientists • Bioinformaticians • Trainee Healthcare Scientists • Healthcare organisations • Medical Staff • Other Healthcare professionals • Clinical research team members, Fellows and nurses Postdoctoral research fellows, PhD students and other trainees or students

ORGANISATIONAL CHART



FREEDOM TO ACT

The post holder will work independently within clearly defined occupational policies and will manage their own workload to meet the demands of the service.

They will have the ability to suggest and implement changes to improve the current service and reflect the changing needs of the service.

COMMUNICATION/RELATIONSHIP SKILLS

Maintain the highest level of patient confidentiality and comply with section 60 of the Health and Social Care Act.

Recognise the importance of harmonious relationships and maintain an atmosphere conducive to this.

Undertake other appropriate duties as delegated by their team lead or the Deputy/Head of Department.

The post holder will frequently:

- Receive complex and sensitive information in order to provide specialist advice to clinicians and other healthcare professionals regarding availability and appropriate use of genetic testing.
- Collate patient and clinical information to assist and support future patient and family management within the context of the referral.
- Communicate complex data and information clearly and concisely to staff from multiple disciplines.
- Communicate with colleagues to understand the variation that can be found in the human genome.
- Represent the Genomics department at regional and national meetings, providing professional input in a manner that can be interpreted and understood by all attendees.
- Communicate the results of their analyses to their clinical colleagues and ensure that what they have done is understood.
- Communicate with users and other laboratories (as appropriate) to request and receive sensitive and complex information necessary for accurate and timely reporting of results.
- Provide and receive complex information where tact and persuasive skills are required, and overcome barriers to understanding.

ANALYTICAL/JUDGEMENTAL SKILLS

- Liaise with and provide specialist advice to technical staff to ensure testing is performed in an accurate manner and maintain the smooth running of the service overall. The highest level of accuracy is required to minimise clinical risk (e.g. an erroneous result that results in an incorrect diagnosis or prediction of carrier status).
- Provide advice to clinicians and other healthcare professionals regarding availability and appropriate use of testing to ensure suitable and efficient use of resources.
- Advise on and participate in all aspects of the delivery of the clinical laboratory service, including sample receipt and processing, data analysis, interpretation and reporting of test results, with appropriate administrative and technical support.
- Ensure appropriateness and prioritisation of patient test referrals, based on specimen and information provided to ensure timely reporting of clinically urgent tests (such as prenatal tests).
- Responsible for the checking and interpretation of results, and preparation and authorisation of reports, in order to provide an efficient and accurate service to users.
- Apply a high level of scientific skill and expertise and assist with troubleshooting of any problems relating to the provision of the service.
- Access relevant sources of information to aid interpretation of patient test results, including collection and critical appraisal of scientific literature and use of genetic information resources available on the internet.
- Interpret and explain results, including calculation of risk, within relevant professional guidelines to clinical colleagues and healthcare professionals.
- Abide by relevant codes of professional conduct.
- Responsible for checking patient results, writing and authorising complex patient reports.
- Submitting a subset of external quality assurance (EQA) reports (for appropriate UKNEQAS and EMQN schemes) to ensure the highest standards of molecular genetic testing according to best practice.
- Abide by relevant codes of professional conduct (HCPC Standards of Proficiency).

PLANNING/ORGANISATIONAL SKILLS

- Responsible for planning own workload, prioritising tasks to meet the demands of the service.
- Undertake an appropriate proportion of the workload, and provide cover for Clinical Scientist colleagues in their absence (as necessary).
- Ensure compliance with all requirements of the Data Protection Act and any other relevant regulations for data protection.
- Take a proactive role in maintaining high quality standards to ensure maintenance of the laboratory UKAS accreditation status.
- Organise referral of samples to appropriate specialist service providers. This may require consultation with referring clinicians and liaison with other laboratories over investigations relating to a particular person or family.

PATIENT/CLIENT CARE

- Provide specialist advice to relevant stakeholders regarding complex data and information.
- To always work within clearly defined accountability framework.
- To provide specialist competence developed through continual professional development, reflective practice and maintain a skills portfolio relevant to the service specification.
- To undertake training to develop a range of knowledge and skills in order to deliver high quality technical interventions.
- To report any untoward incidents or complaints to the appropriate Technical or Scientific Lead within the appropriate timescales.
- To prevent adverse effects on health and wellbeing.

POLICY/SERVICE DEVELOPMENT

- Active involvement in writing, implementing, reviewing and updating Standard Operating Procedures, with input, to developing new protocols.
- Active participation in both internal and external Quality Assurance schemes to ensure the highest standards of molecular genetic testing.
- Take a lead role in audits and the quality management system; ensuring any required action plans are carried out.
- Propose and implement service developments and support specialist research within the laboratory, under the direction of the Principal Clinical Scientists, Deputy/Head of Department.
- To work to Trust Policies, Procedures and Standard Operating Procedures (SOP).
- To contribute to and work within a safe working environment by adhering to statutory requirements, codes of practice, Health and Safety and COSHH regulations, protocols and policies of the laboratory.
- Continuously develop own clinical, scientific and technical practice to provide clinical liaison with a high level of scientific knowledge, skill and expertise.
- Lead on the design and implementation of innovative research and development activities to improve the efficiency of existing diagnostic tests and set up new diagnostic services.

FINANCIAL/PHYSICAL RESOURCES

- Responsible for care and security of expensive equipment and technology used to undertake the role.
- Liaise with and advise technical staff on procurement and stock control of expensive resources e.g. reagents, chemicals, kits.
- Provide advice to clinicians and other healthcare professionals regarding availability and appropriate use of testing to ensure suitable and efficient use of resources.

HUMAN RESOURCES

- Liaise with and provide advice to technical staff to ensure testing is performed in an accurate manner and maintain the smooth running of the service overall. The highest level of accuracy is required to minimise clinical risk (e.g. an erroneous result that results in an incorrect diagnosis or prediction of carrier status).
- Train other staff, placement and work experience students, and visitors in relevant subject area.
- Participate in supervision and appraisal process, identifying own areas of development, & undertaking relevant activities to meet objectives set in Personal Development Plan.
- Keep a record of own training and development, maintain a portfolio, working to sustain acquired competencies for the post.
- Undertake any training required in order to maintain competency including mandatory training, (i.e. Fire, Manual Handling).
- Support the education of laboratory staff through the delivery of training sessions to genomic laboratory diagnostic and research staff at bi-monthly training sessions.
- Demonstrate a professional and responsible manner at all times.
- Take a flexible approach in supporting colleagues during times of caseload pressures.
- Encourage and motivate other team members to obtain optimal results.

INFORMATION RESOURCES

- To access relevant sources of information to aid interpretation of patient test results, including collection and critical appraisal of scientific literature and use of genetic information resources available on the internet.
- To collate patient and clinical information to assist and support future patient and family management within the context of the referral.
- Responsible for data entry, processing and/or storage of complex and highly complex data compiled by self and others, using multiple computer systems.
- Use Laboratory Information Management System (LIMS), variant calling software and other laboratory and Trust systems, as well as sequence analysis, fragment analysis and interpretation software.
- Responsible for maintaining accurate patient records in the laboratory information management system (LIMS).
- Provide an accurate, timely and unambiguous response to queries regarding patient referrals and ensure effective communication, both within the laboratory and with associated healthcare professionals, ensuring that all records of communication are stored and maintained in an appropriate manner.
- Propose changes to working practices for own work area to improve and develop systems in terms of efficiency and quality.
- Responsible for writing, updating and communicating Standard Operating Procedures relating to relating to LIMS, any other IT procedures and processes involving the use of bioinformatics for diagnostic purposes.
- Responsible for detailed and rigorous record-keeping, ensuring strict adherence to quality standards and guidelines.

RESEARCH AND DEVELOPMENT

- Contribute to the design and implementation of innovative research and development activities to improve the efficiency of existing diagnostic tests and develop new diagnostic services.
- Participate in clinically relevant research and development, presenting the results in the literature and at meetings and at conferences to large groups of staff and members of the public, so that the innovations and improvements may become embedded in clinical practice.
- Regularly participate in both internal and external quality control procedures, including clinical and internal audits, and to identify, design and carry out appropriate user satisfaction surveys to ensure continuous quality improvement of services.

PHYSICAL SKILLS

- Daily requirement to use IT equipment with a high degree of precision and accuracy.

PHYSICAL EFFORT

- Daily requirement to sit in a restricted position using IT equipment.
- Occasionally expected to travel offsite to regional and national meetings.

MENTAL EFFORT

- Frequent requirement to concentrate for long periods processing complex information.
- Frequent interruptions to work patterns, with requirement to shift focus quickly in response to frequent urgent incoming requests from internal and external colleagues.
- Frequent need to complete work to tight timescales.
- Frequent requirement for prolonged concentration.

EMOTIONAL EFFORT

- Ability to cope with distressing clinical information provided with patient referrals occasionally.
- Ability to cope and deal with areas of conflict, rarely.

WORKING CONDITIONS

- Frequent daily contact with visual display unit (VDU).

OTHER RESPONSIBILITIES

Take part in regular performance appraisal.

Undertake any training required in order to maintain competency including mandatory training, e.g. Manual Handling

Contribute to and work within a safe working environment

You are expected to comply with Trust Infection Control Policies and conduct him/herself at all times in such a manner as to minimise the risk of healthcare associated infection

As an employee of the Trust, it is a contractual duty that you abide by any relevant code of professional conduct and/or practice applicable to you. A breach of this requirement may result in action being taken against you (in accordance with the Trust's disciplinary policy) up to and including dismissal.

You must also take responsibility for your workplace health and wellbeing:

- When required, gain support from Occupational Health, Human Resources or other sources.
- Familiarise yourself with the health and wellbeing support available from policies and/or Occupational Health.
- Follow the Trust's health and wellbeing vision of healthy body, healthy mind, healthy you.
- Undertake a Display Screen Equipment assessment (DSE) if appropriate to role.

GENERAL

This is a description of the job as it is now. We periodically examine employees' job descriptions and update them to ensure that they reflect the job as it is then being performed, or to incorporate any changes being proposed. This procedure is conducted by the manager in consultation with the jobholder. You will, therefore, be expected to participate fully in such discussions. We aim to reach agreement on reasonable changes, but if agreement is not possible, we reserve the right to insist on changes to your job description after consultation with you.

Everyone within the Trust has a responsibility for, and is committed to, safeguarding and promoting the welfare of vulnerable adults, children and young people and for ensuring that they are protected from harm, ensuring that the Trusts Child Protection and Safeguarding Adult policies and procedures are promoted and adhered to by all members of staff.

At the Royal Devon, we are committed to reducing our carbon emissions and minimising the impact of healthcare on the environment, as outlined in our Green Plan available on our website. We actively promote sustainable practices and encourage colleagues to explore and implement greener ways of working within their roles.

PERSON SPECIFICATION

Job Title	Clinical Scientist (Genomics)

Requirements	Essential	Desirable
QUALIFICATION/ SPECIAL TRAINING		
Educated to Masters level or equivalent relevant experience	✓	
BSc Hons Genetics, Biology or other relevant scientific subject (first or second class).	✓	
Certificate of training competence as a healthcare scientist or equivalent experience as assessed by the Health and Care Professions council (HCPC).	✓	
HCPC registration as a Clinical Scientist.	✓	
KNOWLEDGE/SKILLS		
Detailed knowledge of theoretical and practical aspects of clinical molecular genetics.	✓	
In-depth knowledge of molecular diagnostic tests for inherited disorders and/or acquired genetic disease.	✓	
Good technical knowledge for troubleshooting molecular genetic techniques (including PCR, real-time PCR, droplet digital PCR, Sanger and next generation sequencing) and development of new techniques.	✓	
Ability to interpret complex scientific data and design laboratory experiments.	✓	
Knowledge of Health and Safety, quality management and ISO15189 requirements in a laboratory environment.	✓	
Excellent verbal and written communication skills.	✓	
Excellent organisational skills.	✓	
EXPERIENCE		
Experience working as a Clinical Scientist or Healthcare Scientist in a genomics laboratory.	✓	
Experience of writing clinical diagnostic reports requiring interpretation of results in the context of clinical and scientific knowledge.	✓	
Experience of dealing with telephone enquiries in a courteous and informed manner.	✓	
Experience of laboratory supervisory work.	✓	
PERSONAL ATTRIBUTES		
Collaborative and effective contributor to team working.	✓	
Self-motivated with a proactive approach to work.	✓	
Excellent communication skills (ability to write clear and concise e-mails, presentations and phone conversations).	✓	
Able to remain calm, professional, able to concentrate at all times and work under pressure.	✓	
Enthusiastic, motivated and committed to developing a service.		
Ability to work independently with minimum supervision.		
Adhere to confidentiality and data protection requirements.		
OTHER REQUIRMENTS		
Positive commitment to uphold diversity and equality policies approved by the Trust.	✓	
Flexibility in approach towards working hours.	✓	
Ability to travel to other locations as required.	✓	

WORKING CONDITIONS/HAZARDS		FREQUENCY (Rare/ Occasional/ Moderate/ Frequent) R	O	M	F
Hazards/ Risks requiring Immunisation Screening					
Laboratory specimens	N				
Contact with patients	N				
Exposure Prone Procedures	N				
Blood/body fluids	N				
Laboratory specimens	N				
Hazard/Risks requiring Respiratory Health Surveillance					
Solvents (e.g. toluene, xylene, white spirit, acetone, formaldehyde and ethyl acetate)	N				
Respiratory sensitisers (e.g isocyanates)	N				
Chlorine based cleaning solutions (e.g. Chlorclean, Actichlor, Tristel)	N				
Animals	N				
Cytotoxic drugs	N				
Risks requiring Other Health Surveillance					
Radiation (>6mSv)	N				
Laser (Class 3R, 3B, 4)	N				
Dusty environment (>4mg/m3)	N				
Noise (over 80dBA)	N				
Hand held vibration tools (=>2.5 m/s2)	N				
Other General Hazards/ Risks					
VDU use (> 1 hour daily)	Y				X
Heavy manual handling (>10kg)	N				
Driving	Y	X			
Food handling	N				
Night working	N				
Electrical work	N				
Physical Effort	N				
Mental Effort	Y				X
Emotional Effort	Y	X			
Working in isolation	N				
Challenging behaviour	Y	X			