A plan for the return of laboratory-based research in the School of Genetics and Microbiology during the COVID-19 pandemic.


Purpose of this Document: This document sets out the return to work protocol post COVID-19 Shutdown for the School of Genetics and Microbiology. The goal is the safe resumption of lab-based research activity within the School that protects the health and safety of individual research staff and the wider community.

Return to workplace Committee. This committee was chaired by Prof. Adrian Bracken who had overall responsibility for drafting the return to workplace plan. The committee was composed of the Head of School (Prof. Dan Bradley), Director of Research (Prof. Adrian Bracken), Head of Microbiology Department (Prof. Alastair Fleming), Head of Genetics Department (Prof. Aoife McLyshaght), Chief Technician for Microbiology (Gerry Dowd), Chief Technician for Genetics (Brenda Campbell), Health and Safety Officer for Genetics (Prof. Tony Kavanagh), Health and Safety Officer for Microbiology (David Byrne), as well as Prof. Sinéad Corr. The plan was reviewed by all PIs/lab heads in the School, before being signed by Head of School, Prof. Dan Bradley. It was then reviewed by Estates & Facilities and Health & Safety before being signed off by Dean of Research, Prof. Linda Doyle.

National context: The Department of the Taoiseach and Department of Health published on May 18th, 2020 a “Roadmap for reopening society and business”, which outlines 5 phases. On June 8th, Phase 2 will begin, and this will be when the School of Genetics and Microbiology will return to laboratory-based research. The Irish Government’s guidelines [available at https://dbei.gov.ie/en/Publications/Return-to-Work-Safely-Protocol.html] state that “Workers, like those who work on their own, as well as other workers who can keep a 2 metre distance from others can return to work. Social distancing requirements continue to apply”. It also states that “Organisations are to develop plans for a return to onsite working by employees in light of COVID-19, considering social distancing compliance, hygiene and cleaning, compliance in higher risk situations, plans for medically vulnerable or pregnant people and extended opening hours to enable social distancing”. On May 15th, Trinity College Dublin published their own Guidelines, subsequently updated, for the resumption of research activities on Campus https://www.tcd.ie/research/about/covid-19/return-to-campus.php. This requires that all Schools /TRI/Unit make plans for their return to work, formally known as their Return to Work Risk Assessment. This document outlines the Return to Work Risk Assessment plan of the School of Genetics and Microbiology.

HoS Signature: 

Date: June 5th, 2020
Summary of required actions by all staff and PhD students before being permitted to return to the School:

- Read this Return to Work Risk Assessment document.
- Complete the Pre-return to work form (Appendix 1) and then email it to their departmental office. This is a questionnaire required to ensure each researcher has no symptoms of COVID-19 or are self-isolating /awaiting the results of a COVID-19 test.
- Complete the Risk Assessment form (Appendix 2), to say that they understand the symptoms of COVID-19, will monitor themselves daily and they know what to do in the event that they develop symptoms.
- Attend an online induction session, organized by their Principal Investigator (PI)/Group leader, as well as a college-wide induction session, available from HR and Health & Safety.
- In accordance with Trinity College Dublin policy, the SafeZone App will be used when arriving and leaving College. Everyone working on campus is required to install this app onto their phone. The app records location and working hours and contains useful information about what to do in an emergency.

Justification for return to laboratory-based research at the School of Genetics and Microbiology: The research undertaken by PhD students and postdoctoral researchers in the School of Genetics and Microbiology commonly requires cell, tissue culture and animal experiments that typically last weeks and months, and the majority of usable data is generated at the end of the experiment. Many experiments that began in February and early March of this year had to be prematurely terminated when College closed at the beginning of the COVID-19 lockdown, without generating important data. Therefore, many of our researchers have already effectively ‘lost’ at least 4 months of time in the lab, with little or no data generated since the start of the year. Critically, the window of opportunity for some of our researchers (who are due to finish this year) to resume experiments shortens by the week, and if they are not allowed to imminently return to laboratory-based research, they will be unable to complete their work. This includes PhD students who are due to finish in September and postdoctoral researchers working on ERC, IRC, SFI and Wellcome funded projects with key deliverables in the coming months. No funding is available to extend the contracts/stipends of most of these researchers, and ‘no cost’ extensions are of no benefit as salary costs continue to be accrued during the period of the lockdown. Scientific discoveries and breakthroughs that may have happened this year could be another casualty of COVID-19. Furthermore, if we cannot resume laboratory-based activities, we will be unable to meet certain contractual agreements or realise deliverables associated with externally funded research projects.

Restricting the numbers of people in The School of Genetics and Microbiology to ensure a safe working environment during the COVID-19 pandemic. The majority of our researchers (Research staff and PhD students) require access to our laboratories to carry out their work. In total, we have identified 24 researchers in the Department of Microbiology (Moyne Institute) and 60 in the Department of Genetics (Smurfit Institute) that require access to labs. Even when all 84 of these researchers are granted permission to resume laboratory-based research, we can maintain adequate physical/social distancing by implementing the plan detailed below. To achieve this, each of the individual research labs in the school has been
carefully mapped out into blocks which can take one person at a time (Appendices 3-6). This separation will be strictly imposed (See further details on **Checking of compliance** below).

The **Moyne Institute (Department of Microbiology)** is a stand-alone building and its large square footage is conducive to social distancing. The majority of research groups in the Moyne Institute can accommodate the researchers who need the space, even after the mapping exercise (Appendices 5-6). However, to achieve social distancing for all, the plan is to move 9 of the 24 researchers to free available space outside of their normal labs (Detailed in Appendix 9).

The **Smurfit Institute (Department of Genetics)** building will have a greater demand for research space. Of a total cohort of 67 researchers (Research staff and PhD students), 61 will require access to the Smurfit building to conduct experiments from June 8th. The other 6 researchers have computer based projects and will continue to work from home. After carefully mapping every room in the Genetics Department buildings, we reduced the previous total of 87 workspaces by ~50% to 44 to accommodate the social distancing requirements. To ensure that the 61 researchers can avail of the available 44 workspaces, each individual research group will take measures, including flexible shift work, establish online booking systems and weekend work in the majority of cases. Attention will be taken to ensure that work shifts are voluntary and not enforced upon people and a case will have to be made to the Head of School in each case where normal working-times (weekdays 10am-4pm) are not adhered to. Furthermore, no one will be allowed to work alone and ‘buddy systems’ will be employed to ensure this (Detailed in Appendix 5).

Importantly, with these above plans in place, we believe we have ample space to accommodate all researchers who will want to return to the lab. Therefore, while we don’t anticipate the need for prioritisation of researchers, should it be required, it will be managed at lab level by the PIs, who will know the needs of each member in their respective groups.

**All meetings will continue to be held online.** Physical face-to-face interactions at work, including hand shaking, group meetings and 1:1 meetings in offices are prohibited. All tasks that can be undertaken at home will be, e.g. data-analysis, report writing etc. All School researchers who come to the School should confine the time they spend on the premises to carrying out research activities that cannot be facilitated remotely. This kind of generosity and community spirit will help accommodate as many lab mates and colleagues as possible.

**Premises Reconfiguration and Signage.** Careful thought has been made to reconfigure the buildings in the school. Appropriate signage has been placed through-out the School and is designed to promote safe behaviour. This includes reminders about social distancing, markings on floors, identification of desks/workstations that are out of bounds, signs on lifts and common areas, entrance and exit signs etc. This signage aims to promote worker safety through emphasising basic infection prevention measures, including hand-washing signs in bathrooms. Signage has also been affixed on selected light/power switches to remind occupants to keep switches ‘on’ all day to avoid the need to touch. In both buildings, some internal doorways, that are not deemed ‘fire doors’, will be left open so as to reduce some high contact areas. Some specific reconfgurations to each building are detailed just below:
**Moyne Institute (Department of Microbiology):** Entry will be through the main door and exit through side-doors and this will be indicated by clear signage. A one-way system will be implemented, indicated by signage, and a “Keep right” policy where not possible.

**Kitchen:** The Microbiology Department’s kitchen will remain open to allow staff and PhD students access to drinking water, kitchen equipment and a safe place to eat. Windows will be kept open during the day to increase ventilation. The number of tables in the room will be reduced to 3 with only one chair per table permitted (See map in Appendix 6). Therefore, the maximum occupancy of the kitchen will be 3 people. Staff and PhD students will be expected to wipe down the tables before and after use with a neutral detergent (as per ECDC guidelines: https://www.ecdc.europa.eu/en/publications-data/disinfection-environments-covid-19). Hand sanitiser and handwashing facilities will be provided within the kitchen.

**Bathrooms:** The current environmental reports for SARS-CoV-2 virus survival indicate that bathrooms are potentially a source of increased transmission risk, possibly due to the enclosed spaces and reduced ventilation, and/or aerosols generated from flushing toilets. Therefore, it is recommended that, where possible, the windows remain open in bathrooms. All bathrooms will have a maximum occupancy of 1 person. Signage will be outside to indicate if the toilet is occupied or not. Signage will also be inside to remind people to flush toilets with the seat down and then to wash hands thoroughly. Where exit doors or handles present a possible hazard as frequently touched surfaces, hand sanitiser will be provided outside of the bathroom.

**Communal offices:** Researchers will be required to do writing at home. Where computer facilities are required for research, access to these offices will be granted on a case-by-case basis and organised so that room occupancy guidelines are adhered to.

**Lifts:** These will not be used unless moving heavy equipment. In these circumstances, only one person will be allowed per lift.

**Smurfit Institute (Department of Genetics):** Entry and exit will be permitted through the main door at Lincoln Place Gate, which is deemed sufficiently wide to accommodate social distancing. However, clear signage will instruct people to keep right. This ‘keep right’ policy will also be implemented throughout the Smurfit Institute and adjoining Westland Row buildings. The stairwells inside both building will be used for moving between floors, while the lifts and external stairwells in the Smurfit Institute building will be unavailable for this purpose.

**Kitchenette:** Due to its small size, the Genetics Department’s kitchenette will remain closed for the time being. We will review this at a later time.

**Bathrooms:** All bathrooms in the Genetics Department will have a maximum occupancy of 2. People will be required to look in and determine if full or not. They should wait outside at a distance of 2M or more until a toilet becomes available. Signage will also be placed inside all bathrooms to remind people to flush with the toilet seat down and wash hands thoroughly afterwards. Hand sanitiser dispensers have been installed on the wall in the corridor area near the lift on Levels 1, 2 and 3 in the main Smurfit building.
Smurfit Institute Atrium: The maximum occupancy of this large open area will be reduced to 7 people. To implement this, only 7 tables have been made available and only one chair per table will be permitted (see map in Appendix 3). Staff and PhD students will be expected to wipe down the tables before and after use with a neutral detergent (as per ECDC guidelines: https://www.ecdc.europa.eu/en/publications-data/disinfection-environments-covid-19). Hand sanitiser and handwashing facilities will be provided.

Lifts: These will not be used unless moving heavy equipment. In these circumstances, only one person will be allowed per lift.

Logistics & Management.

Going forward, the Return to workplace Committee will maintain this Return to work document in constant review and update it should Government advice and policy change, or if Trinity issues further guidance. This will necessitate that staff and PhD students in the School read any updated versions of this online document should any changes be made.

Chief Technicians, Brenda Campbell (Department of Genetics) and Gerry Dowd (Department of Microbiology) have managed all practical aspects of reorganizing the school buildings, and will continue to do so. They coordinated and facilitated these measures by liaising with premises manager, Jonathan Fitzpatrick. This involved the addition of signage and PPE throughout the buildings and several departmental reconfigurations. Going forward, both Chief Technicians will be responsible for maintaining these practical aspects, including the relevant people in the Estates and Facilities to ensure all building level requirements, including cleaning and waste disposal are being addressed. Revised and defined cleaning rotas from E&F/Housekeeping will be implemented (See Appendices 11 and 12 for modifications to waste disposal and glass cleaning facilities for the two Departments).

The Health and Safety Officers for Genetics (Prof. Tony Kavanagh) and Microbiology (David Byrne) will be responsible for managing the safe running of the Smurfit and Moyne buildings, respectively. This will include the systematic checking of compliance of social distancing, liaising with the PIs of researchers and revoking access where necessary (See further details on Checking of compliance below).

Principal Investigators (PIs)/Group leaders will be required to hold an induction session(s) for the research staff and PhD students in their respective groups. This specific and local induction about local rules will be needed in conjunction with the college-wide induction session available for all created by HR and Health & Safety. These inductions will have to be repeated when new group members join.

Principal Investigators (PIs)/Group leaders will also be responsible for timetabling activities for their individual research groups within the designated shifts, as required, and keeping records. They will also maintain detailed online booking systems (e.g. Google Sheets, Microsoft Teams Shifts or ClickUp) for all shared equipment. It will not be possible to use any shared equipment/facilities without booking in advance. These booking systems and records will facilitate developing a log of contacts/group works for contact tracing, which is a requirement of the Government’s return to work protocol. PIs will also be responsible for ensuring all staff and PhD students in their groups that have returned to the school have completed the two forms (Appendices 1 and 2).
The **Departmental Executive Officers** for both departments will maintain records of every individual researcher who has emailed the **Pre-return to work form** (Appendix 1) and the **Risk Assessment form** (Appendix 2), which must be submitted before researchers can be permitted to return to work.

**Housekeeping staff** will service all areas agreed in the morning with an additional afternoon service focusing on touch points, stairways and bathrooms.

**Lab users will be expected to complete wipe downs within their own work areas** at the end of each working period.

**Required Behaviours and expectations of all Staff and PhD students.**

The following important behaviours are both expected and compulsory:

- All researchers must attend **online Induction** training prior to returning to the School. This will be in the form of a PI led online discussion to each individual lab team in the week prior to return to work. PIs will discuss the contents of this RTW document, including safety, implementation of the rules, procedures if feeling symptoms, lab rotas, equipment booking systems etc. There will hopefully also be a college video available from Health and Safety.
- All researchers must complete the Pre-return to work Form (see Appendix 1), at least 3 days prior to coming back to work, which requires them to confirm that they have no symptoms of COVID-19 and are not self-isolating /awaiting the results of a COVID-19 test. This form also asks all researchers to confirm that they have read this RTW document, familiarised themselves with the new safety restrictions and protocols and attended the online Induction Training by their group leader/PI. This questionnaire must be completed and emailed to the executive administrator (magoverj@tcd.ie for Microbiology or genetics@tcd.ie for Genetics) in advance of returning to work. These records will be maintained by the respective executive officers of each department.
- All researchers must complete the Risk Assessment form (Appendix 2), to say that they understand the symptoms of COVID-19 (https://www2.hse.ie/coronavirus), will monitor themselves daily and they know what to do in the event that they develop symptoms. This form also requires that all researchers maintain a Daily Contact record. This will supplement the room booking system which will function as the employers contact log.
- All personnel to access college via Lincoln Gate Place.
- Users **must wash their hands** both upon arrival and upon completion of each research activity. This will be emphasised regularly and communicated with signage at all entrances to the labs and offices. Respiratory hygiene and cough etiquette are expected at all times.
- All items such as PPE, wipes etc used in the lab for cleaning should be disposed of via the lab waste stream.
- Users are **only permitted to access School buildings to perform research-related activities**.
- When ‘wet-lab’ researchers have completed their work and disinfected their work area, they should leave immediately. In most cases, their computer-based work can be carried out from home.
• Office-based work will only be permitted in special circumstances where the researcher has prior permission from the Head of School to use office or computer space in the buildings. This will be assessed on a case by case basis and permitted only where clear justification exists and office occupancy will be limited to 1 person.

• Compliance with social distancing (minimum 2m) and strict room occupancies. Physical distancing must be maintained during breaks and there are strict limits in numbers in the eating areas in both Departments.

• All staff and PhD students are required to book ahead for both their time and days in the lab and their use of shared equipment and facilities, such as tissue culture hoods. Nobody should be present in the building or using shared equipment without a prior booking. This is vital for everyone since these online booking systems, which will be maintained by group PIs, will also function as a contact tracing logs, should they be required.

• All work areas and instruments used must be disinfected by the lab user both before commencing and after finishing work activities. This includes disinfecting door handles to all labs used. Neutral cleaning products (follow manufacturer’s guidelines for effective use) or 70% alcohol (spray and allow to evaporate) will be easily available for people to use to clean communal equipment before and after use. Where possible, interaction with frequently touched surfaces should be minimised, for example lights should remain on and doors kept open where possible.

• Maintaining a Personal Contacts Log. A contacts log should be kept by each person coming on site, so that a record is maintained of all colleagues they come in contact with over the course of a day. This will supplement the room and equipment booking systems and will allow for contact tracing if researchers become ill at a later date.

• The SafeZone App must be used when arriving and leaving College. Everyone working on campus is required to install this app onto their phone. The app records location and working hours and contains useful information about what to do in an emergency.

• It is important that all staff and PhD students have an up-to-date record of key contact numbers, including lab mates, their PI, their Health and Safety Officer and their GP. The Trinity College Health Centre numbers are 01 896 1591 and 01 896 1556.

• In case of Fire Alarm people should naturally leave by the nearest Exit.

• Nobody should work alone in either the Genetics or Microbiology Departments at any time. To address this, several labs will establish ‘buddy systems’ via Whatsapp Groups and other such platforms.
Promotion of Safe Behaviours & Compliance: Trinity College Dublin guidelines state that the School "should organise a systematic way for checking compliance. This should be carried out regularly. Non-compliance should result in revoking of access. It is important to note that the Health Safety Authority can check for compliance and will close down operations should they find issues". To do this, the Return to workplace Committee decided that if anyone in the School witnesses non-compliance with the above listed expected behaviours, they should report these breaches by emailing their departmental Health and Safety Officer (Dave Byrne byrned@tcd.ie in Microbiology and Tony Kavanagh tkvanagh@tcd.ie in Genetics). They will not disclose the identity of the person reporting the non-compliance and their discretion, judgement and common sense will be vital in managing this. They will be required to contact the individual and their PI and issue a first warning. The PI will then be required to speak with the individual and suggest how to avoid non-compliance in future – the hope and expectation here is that in most/all cases this will just be a lack of awareness and informal promotion of safe behavior will prevent subsequent issues. However, a second report of non-compliance for any particular individual will require that the safety officer again contact PI and individual, but this time revoke access to School buildings for one full week. A third report of non-compliance will lead to access being revoked for 1 month.

Response plan for dealing with a Suspected Case of COVID-19 in the Workplace.

1. In the first instance anyone who feels unwell with flu or flu-like symptoms in advance of coming to work should stay at home, contact their GP and follow the guidelines provided by the HSE.
2. Should a staff member or PhD student develop symptoms of COVID-19 while at work, they should self-isolate in designated rooms. In the Genetics Department, this room is Room 1.04A on the first floor of the Westland Row building (See Appendix 4). A key for this room will be left in each lab. In the Microbiology Department, the isolation room is highlighted in Blue on the first floor of the Moyne Institute (See map in Appendix 6). These rooms have windows that can be opened and will be equipped with hand sanitiser, 70% IPA wipes, tissues, additional face masks, a clinical-waste disposal bin and a land line.
3. The unwell individual should then immediately seek help by contacting their PI/group leader by phone and their Department’s Health & Safety Officer. They should maintain strict social distancing of at least 2m throughout and avoid surfaces and objects.
4. The PI and Safety Officer will assist the unwell individual contact the College Health Centre at 01 896 1591/01 896 1556 or their own GP.
5. Based on the doctor’s advice the PI and Safety Officer will assist the unwell person to make transport arrangements to go home or to hospital for medical assessment. Public transport of any kind should not be used.
6. The PI and Safety Officer are to take down the names and contact details (address, mobile number) of all people working in the same area as the unwell person, or who have come into close contact with the unwell person to provide to the HSE for the purposes of contact tracing.
7. Following a suspected case being reported, the individuals in the building who have been in close contact (working in the same lab/area or have been <2m from the person for more than 15 min) will be advised to go home, avoiding public transport and to self-isolate for a period of 14 days following the HSE guidelines.
8. The Departmental Safety Officer will contact everyone in their respective Department advising them to go home/stay at home and will close the building for up to 72 hours.
9. The Departmental Safety Officer will contact Estates and Facilities to arrange a decontamination/deep clean of the building and specifically the areas where the person has been located.

10. The Departmental Safety Officer will document the incident using the standard incident reporting form and submit. When contacted by the HSE, the Departmental Safety Officer should use the records kept regarding Direct Contact to identify people who have been in contact with the individual.

Additional Health & Safety considerations for researchers:

- The return to the workplace should be agreed and voluntary for both researcher and PI.
- No individuals in the ‘very high’ risk category for COVID-19 (as defined by HSE guidelines) will be allowed return to campus at this time. Researchers with dependents or housemates in a very high-risk category should also not return to work at this time.
- In case of doubt about potential risks of a return to work, medical advice should be sought by the researcher intending to return to work.
- Access will be denied to any individual who: (1) is feeling unwell; (2) has been in close contact with a confirmed or suspected COVID-19 case in the previous 2 weeks; (3) is unable or unwilling to comply with these operational & hygiene procedures. All workers must stay out of the Moyne and Smurfit Institute buildings until all symptoms of COVID-19 have cleared following self-isolation.
- All researchers will follow relevant government guidelines if they display any of the symptoms of COVID-19, as will those who have been in contact with any person displaying symptoms (i.e. their group members).
- Personal Protective Equipment (PPE) will not be required for general research work considering all staff and PhD students will be maintaining social distancing. However, in the rare, exceptional circumstances in which social distancing cannot be maintained for a particular activity, such as training or jobs requiring two people in close proximity, the activity will be risk assessed and face masks and additional PPE employed. After use, PPE should be disposed of via the lab waste stream.
- If a researcher with prior access to the workplace should develop symptoms of Covid-19, the work area will be cordoned off, a review will be undertaken involving the relevant PI and the Departmental Safety Officer, and appropriate cleaning will be arranged through Estates & Facilities.
- Standard laboratory PPE must be used by all researchers as they would normally do in the course of their work. If mandated by government or the School’s health and safety officer, the wearing of additional PPE such as masks may also be implemented. After use, all PPE should be disposed of via the lab waste stream.
- Public transport should be avoided where possible, especially at peak times due to capacity limitations. General guidance and updates are available on TFI: https://www.transportforireland.ie/news/covid-19-information.
- PPE such as lab-coats should be retained in a bag on site and kept on campus and laundered using a specialist service periodically.
Appendix 1: Pre-return to work Form.

Government guidelines require the completion of a pre-return to work form declaring that you have no symptoms of COVID-19 and are not self-isolating /awaiting the results of a COVID-19 test. Please answer the following questions and return to the executive administrator (magoverj@tcd.ie for Microbiology or genetics@tcd.ie for Genetics) in advance of returning to work.

1. Do you have symptoms of cough, fever (38°C and over), sore throat, runny nose, breathlessness or flu like symptoms now or in the past 14 days? Yes/No

2. Have you been diagnosed with confirmed or suspected COVID-19 infection in the last 14 days? Yes/No

3. Are you a close contact of a person who is a confirmed or suspected case of COVID-19 in the past 14 days (i.e. less than 2m for more than 15 minutes accumulative in 1 day)? Yes/No

4. Have you been advised by a doctor to self-isolate at this time? Yes/No

5. Have you been advised by a doctor to cocoon at this time? Yes/No

6. Please confirm that you have read the School of Genetics & Microbiology Return to Work and Risk assessment, had a group induction training from your PI and have familiarised yourself with the new safety restrictions and protocols that have been implemented. Yes/No

Signed:__________________________________

Date:  __________________________________
Appendix 2: Risk Assessment Form.

TCD and School guidelines require the completion of this Risk Assessment Form. Please complete and return to their executive administrator (magoverj@tcd.ie for Microbiology or genetics@tcd.ie for Genetics) and copy your PI/group leader in advance of returning to work.

Infection with the virus that causes COVID-19 can cause illness, ranging from mild to severe, and, in some cases, can be fatal. It can take anything from 2 days up to 14 days for symptoms of coronavirus to appear. They can be similar to the symptoms of cold and flu. Common symptoms of coronavirus include:

• a fever (high temperature - 38 degrees Celsius or above).
• a cough - this can be any kind of cough, not just dry.
• shortness of breath or breathing difficulties.

For the complete list of symptoms, please refer to the HSE website: https://www2.hse.ie/coronavirus. Note that some people infected with the virus, so called asymptomatic cases, have experienced no symptoms at all.

Following return to work, you must complete this Personal Daily Questionnaire (There’s no need to email this to anyone. Please just keep a personal record):

a) Have you had a recent cough?

b) Have you a shortness of Breath?

c) Are you experiencing respiratory Illness?

d) have you a fever (38°C and over, please check temperature daily)?

e) Have you been advised to self-isolate in the past 14 days?

Important: If you experience any of these symptoms, do not return to work.

In the event that you experience any COVID-19 symptoms, please immediately notify your PI and Departmental Safety Officer (Dave Byrne byrned@tcd.ie in Microbiology or Tony Kavanagh tkvanagh@tcd.ie in Genetics) and follow the HSE guidelines regarding self-isolation. You must also contact your GP or TCD Health Centre at 01 896 1591/01 896 1556 and follow the instructions given. Self-isolation rooms are available in both the Genetics and Microbiology Departments (See Maps in Appendices 4 and 6 of the School’s Return to Work document)

Daily Contact record: Following return to work, you must also keep note each day, of any person you come into contact with. In the event that you show symptoms of COVID19, this will help with contact tracing.

Please sign to indicate that you agree to adhere the above guidelines.

Signed: ______________________________________

Date: ______________________________
Appendix 3: Detailed Room Usage for the Smurfit Institute of Genetics (main building):

The maximum capacity of each space due to be occupied in the School was calculated based on the 2m social distancing rule. This was done through a mapping process. The red boxes in all floor maps below represent workspaces in which a maximum of one person is permitted to work at any one time.
RED - Only one person permitted per workspace

THIRD FLOOR PLAN

RED - Only one person permitted per workspace

EAST END 4/5 BASEMENT FLOOR PLAN
Specific usage of basement facilities by the Mani Ramaswami research group.

Room 9: Tissue culture room: Used by: Jens Hillebrand, Arnas Petrauskas, Joern Huelsmeier for: 1-4 hours at a time by one person only. Will likely be used daily by one of the three people according to the lab’s schedule.

Room 14: Storage room: Used by: Joern Huelsmeier, Jens Hillebrand, Arnas Petrauskas for 20 minutes at a time, by one person only. Likely to be used once every two weeks or less.

Room 7: Fly cooking facility (on the far-right hand side corner of the room); Used by: Daniela Rosca, Joern Huelsmeier for 2 hours per block, by one person. This will be two 2-hour blocks, one day a week, one two hour block on the following day. Day of the week will be dependent on Daniela’s schedule. Next week it will be Tuesday afternoon and Wednesday morning.

Room 8: Autoclave room: Used by Daniela Rosca, Joern Huelsmeier for 10-15 minutes per usage of room 7.
Appendix 4: Detailed Room Usage for the Smurfit Institute of Genetics (Westland Row building):
The maximum capacity of each space due to be occupied in the School was calculated based on the 2m social distancing rule. This was done through a mapping process. The red boxes in all floor maps below represent workspaces in which a maximum of one person is permitted to work at any one time. A key for the isolation room (Room 6) will be left in each lab.
Appendix 5: Details of how each research group in the Smurfit Institute of Genetics will manage the occupancy restrictions:

Of a total cohort of 67 researchers (Staff and PhD students), 61 will require access to the Smurfit building to conduct experiments after June 8th. A previous total of 87 workspaces was more than ample to accommodate these prior to social distancing requirements. However, the total number of workspaces has been reduced by about 50% to 44. The table below outlines the measures each individual group will take to ensure that 61 researchers can avail of 44 workspaces. This will involve flexible shift work and booking systems in the majority of cases.

<table>
<thead>
<tr>
<th>Group name</th>
<th>Total group members</th>
<th>Continue to work from home</th>
<th>Return to lab on June 8th</th>
<th>Workspace (Total)</th>
<th>Workspace (After restrictions)</th>
<th>Strategy taken by group</th>
</tr>
</thead>
<tbody>
<tr>
<td>drunken</td>
<td>12</td>
<td>0</td>
<td>9 (second floor) + 2 (first floor) + 1 (elective free)</td>
<td>12</td>
<td>6</td>
<td>2 shifts (8am-1,30pm and 2,30pm-9pm) Monday to Friday plus weekend days on a semi-flexible booking system. A buddy system in place to ensure nobody works alone. (<em>May eventually change to 7 or 7,30am, depending on if cleaning can be arranged earlier)</em></td>
</tr>
<tr>
<td>Bradley</td>
<td>11</td>
<td>0</td>
<td>9 (second floor) + 2 (basement)</td>
<td>11</td>
<td>5</td>
<td>Some researchers will only need to return sporadically. Therefore lab will operate on full day basis, but with a booking system to ensure social distancing maintained.</td>
</tr>
<tr>
<td>Brian</td>
<td>2</td>
<td>0</td>
<td>2 (first floor)</td>
<td>2</td>
<td>2</td>
<td>No shift work needed</td>
</tr>
<tr>
<td>Campbell</td>
<td>8</td>
<td>0</td>
<td>8 (third floor)</td>
<td>8</td>
<td>5</td>
<td>Combination of shift work and some members working in mouse unit.</td>
</tr>
<tr>
<td>Farmer</td>
<td>5</td>
<td>0</td>
<td>1 (second floor) + 8 (third floor)</td>
<td>9</td>
<td>6</td>
<td>Flexible shifts coordinated at group level</td>
</tr>
<tr>
<td>Humphries</td>
<td>6</td>
<td>0</td>
<td>6 (third floor)</td>
<td>6</td>
<td>3</td>
<td>Flexible shifts coordinated at group level</td>
</tr>
<tr>
<td>Martin</td>
<td>4</td>
<td>0</td>
<td>4 (second floor)</td>
<td>13</td>
<td>7</td>
<td>No shift work needed</td>
</tr>
<tr>
<td>McLaughlin</td>
<td>5</td>
<td>4</td>
<td>1 (second floor)</td>
<td>5</td>
<td>2</td>
<td>No shift work needed</td>
</tr>
<tr>
<td>McIgyugh</td>
<td>4</td>
<td>2</td>
<td>1 (1st floor) + 5 (Desire lab, 1st floor)</td>
<td>12</td>
<td>3</td>
<td>No shift work needed</td>
</tr>
<tr>
<td>Wellner</td>
<td>6</td>
<td>0</td>
<td>5 (main lab 1st floor) and 1 (Desire lab, 1st floor)</td>
<td>9</td>
<td>5</td>
<td>No shift work needed. 2 members of group share accommodation, don’t need to social distance and therefore can share one desk.</td>
</tr>
</tbody>
</table>

67 | 6    | 87 | 44
Appendix 6: Detailed Room Usage for the Moyne Institute (Department of Microbiology):

The maximum capacity of each space due to be occupied in the School was calculated based on the 2m social distancing rule. This was done through a mapping process. The red boxes in all floor maps below represent workspaces in which a maximum of one person is permitted to work at any one time.
TEA ROOM. 3
Tables. 1 person per table.

RED one person per workspace
RED one person per workspace

BLUE Designated isolation room for anyone who develops COVID-19 symptoms
Appendix 8: Moyne Institute (Department of Microbiology)  
Occupancy (Based on area size):

<table>
<thead>
<tr>
<th>Room No.</th>
<th>Max occupancy</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>B.16</td>
<td>2</td>
<td>Prep Room</td>
</tr>
<tr>
<td>B.14</td>
<td>2</td>
<td>U. Bond</td>
</tr>
<tr>
<td>B.14a</td>
<td>1</td>
<td>U. Bond</td>
</tr>
<tr>
<td>B0.03a</td>
<td>1</td>
<td>TC common</td>
</tr>
<tr>
<td>B0.03b</td>
<td>1</td>
<td>TC common</td>
</tr>
<tr>
<td>B0.03</td>
<td>6</td>
<td>M. Martins</td>
</tr>
<tr>
<td>B.12</td>
<td>6</td>
<td>C.J. Dorman</td>
</tr>
<tr>
<td>B.12a</td>
<td>1</td>
<td>C.J. Dorman bio-informatics</td>
</tr>
<tr>
<td>0.07</td>
<td>1</td>
<td>Incubator room common</td>
</tr>
<tr>
<td>0.06a</td>
<td>1</td>
<td>Teaching Prep</td>
</tr>
<tr>
<td>0.12</td>
<td>2</td>
<td>A. Fleming</td>
</tr>
<tr>
<td>0.13a</td>
<td>1</td>
<td>Equipment AF</td>
</tr>
<tr>
<td>0.15</td>
<td>1</td>
<td>TC common</td>
</tr>
<tr>
<td>0.16</td>
<td>1</td>
<td>Equipment common</td>
</tr>
<tr>
<td>0.17</td>
<td>1</td>
<td>TC K. Roberts</td>
</tr>
<tr>
<td>0.18</td>
<td>2</td>
<td>C. Kroeger/ K. Roberts</td>
</tr>
<tr>
<td>1.04</td>
<td>2</td>
<td>S. Corr</td>
</tr>
<tr>
<td>1.07</td>
<td>1</td>
<td>-80 freezer storage common</td>
</tr>
<tr>
<td>1.17</td>
<td>2</td>
<td>J. Geoghegan</td>
</tr>
<tr>
<td>1.18</td>
<td>1</td>
<td>Equipment common</td>
</tr>
<tr>
<td>1.19</td>
<td>1</td>
<td>Equipment common</td>
</tr>
<tr>
<td>1.20</td>
<td>2</td>
<td>Departmental</td>
</tr>
</tbody>
</table>
### List of Researchers for RTW

<table>
<thead>
<tr>
<th>Group</th>
<th>Lab capacity</th>
<th>Phase 1</th>
<th>Phase 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>JG</td>
<td>2</td>
<td>Martin Sutton, Mary Turley, Thaina da Costa</td>
<td></td>
</tr>
<tr>
<td>CJD</td>
<td>6</td>
<td>Aalap More, Michael Beckett, German Pozdeev</td>
<td></td>
</tr>
<tr>
<td>MM</td>
<td>6</td>
<td>TJ Butler, Rushil Ravichandran, Candida Trigueiros</td>
<td></td>
</tr>
<tr>
<td>UB</td>
<td>2</td>
<td>Roberto de la Cerda Garcia Caro</td>
<td></td>
</tr>
<tr>
<td>SC</td>
<td>2</td>
<td>Amy O'Callaghan, Namrata Iyer, Elaine Dempsy, Jinfan Wang</td>
<td></td>
</tr>
<tr>
<td>AF</td>
<td>2</td>
<td>Brenda Lee, Nicole Byrne, Mohamed Alhussain</td>
<td>Hadel Aljaeed, Reham Alnajar</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>22</strong></td>
<td><strong>19</strong></td>
<td><strong>5</strong></td>
</tr>
</tbody>
</table>

**Note:**
SC and AF labs have maximum 2-person occupancy. The additional researchers (2 SC, 1 AF, will be housed in MM and CJD labs respectively (basement, max capacity 6 each) for Phase 1 return. JG lab has a maximum 2-person occupancy and will operate flexible shifts agreed at group level.

For the Phase 2 return, this will be in August for Ali Bakheet, Hadel Aljaed and Reham Alnajar and at an unspecified later date for Mary, Anna and Alejandro. Each of these 6 researchers will be accommodated safely in already free available space (MM and CJD labs in the basement, what was previously the Ronnie Russell lab (room 1.20), and in room 0.16 on the first floor). Any additional future researchers will also be housed in one of the aforementioned labs.
Appendix 10: Use of the Animal unit on the third and fourth floor of the Smurfit Institute Building.

For those users of the animal unit in the Genetics Department, please refer to the website (https://www.tcd.ie/comparativemedicine) of the Comparative Medicine Unit (CMU) for detailed information on Standard Operating Procedures (SOPs) that will be in place. The Genetics Department’s representative for the CMU is Prof. Matthew Campbell (CAMPBEM2@tcd.ie), who will be able to provide further information in this regard.

Appendix 11: Modifications to Smurfit Institute waste disposal and glassware cleaning facilities.

All autoclavable waste should be brought down to the building’s basement by individual researchers. They should leave the glassware to be collected in a box or trolley outside their lab doors for collection only on Monday and Tuesday. The cleaned glassware will be left on the bench in the basement, as usual for collection. For now, if researchers need to bring glassware down on any other day, they can put the washer on themselves and collect when wash is finished.

The autoclaves, ice machines and glass washing machines will be used with common sense, such that if there is someone using them, researchers will be required to wait in the corridor until they have finished.

Appendix 12: Modifications to Moyne Institute waste disposal facilities.

All waste for autoclaving is to be brought to the Moyne Institute prep room by the individual researcher and left in a designated area. It will then be autoclaved and disposed of in the normal manner by prep room staff.