NHS BLOOD AND TRANSPLANT
ORGAN DONATION AND TRANSPLANTATION DIRECTORATE

THE NINETEENTH MEETING OF THE NHSBT CTAG(L) LUNGS ADVISORY GROUP ON WEDNESDAY 28 SEPTEMBER 2022, 10:30-14:30 VIA MICROSOFT TEAMS

Attendees:

Jasvir Parmar	**CTAG Lungs Chair**, Royal Papworth Hospital
Ayesha Ali	Highly Specialised Services, NHS England
Richard Baker	Associate Medical Director - Clinical Governance, OTDT, NHSBT
Marius Berman	Joint Associate Clinical Lead for Organ Retrieval, NHSBT. Royal Papworth Hospital
Robert Burns	Co-Chair, CTAG Patient Group
Martin Carby	Respiratory Physician, Harefield Hospital
John Dark	Professor of Cardiothoracic Surgery, Freeman Hospital, Newcastle
Andrew Fisher	NIHR BTRU Representative, Freeman Hospital, Newcastle
Diana Garcia Saez	National Clinical Lead for Organ Utilisation (CLU)
Dale Gardiner	Associate Medical Director – Deceased Organ Donation, NHSBT
Vicky Gerovasili	National Lung Clinical Lead for Utilisation (CLU)
Shamik Ghosh	CTAG Lay Member Representative
Gill Hardman	CTAG Clinical Audit Group Cardiothoracic Fellow, Freeman Hospital
Margaret Harrison	CTAG Lay Member Representative
James Hunter	QUOD, Academic Clinical Lecturer in Transplant, Oxford
Sam Kennedy	Freeman Hospital, Newcastle
Gerard Meachery	Joint Centre Director, Freeman Hospital, Newcastle
Nkechi Onwuka	Statistician, Statistics and Clinical Research, NHSBT
Aaron Ranasinghe	National Heart Clinical Lead for Utilisation (CLU)
Karen Redmond	NI CTAG Lungs Observer
Sally Rushton	Senior Statistician, Statistics and Clinical Research, NHSBT
Karthik Santhanakrishnan	Respiratory Physician, Wythenshawe Hospital
Philip Seeley	Transplant Co-ordinator, Freeman Hospital
Lewis Simmonds	Statistician, Statistics and Clinical Research, NHSBT
Helen Spencer	Great Ormond Street Hospital
Rajamiyer Venkateswaran	CTAG Hearts Chair, Wythenshawe Hospital, Manchester
Debra Thomas	Deputy Physician Representative, Royal Papworth Hospital
Richard Thompson	Respiratory Medicine, QEH, Birmingham
Sophie Walters	Heart & Lung Transplant Coordinator
Sarah Watson	NHS England
Craig Wheelans	National Services Division, NHS Scotland
Julie Whitney	Head of Service Delivery, OTDT Hub, NHSBT
Claire Williment	Accountable Executive – Organ Utilisation Programme; Legislation Implementation, NHSBT

In attendance:

Caroline Robinson	Advisory Group Support, NHSBT (Minutes)

Item	APOLOGIES AND WELCOME	Action
	• J Parmar welcomed everyone to the meeting. • Apologies were received from Malcolm Brodlie, Catherine Coyle, Ian Currie, Pradeep Kaul, Jim Lordan, Debbie Macklam, Derek Manas, Jorge Mascaro, Stephen Pettit, Laura Stamp	
1	**DECLARATIONS OF INTEREST**	
	There were no declarations of interest raised at the meeting. ***NB: It is the policy of NHSBT to publish all papers on the website unless the papers include patient identifiable information, preliminary or unconfirmed data, confidential and commercial information or will preclude publication in a peer-reviewed professional journal. Authors of such papers should indicate whether their paper falls into these categories.***	

2	**MINUTES AND ACTION POINTS OF THE CTAG LUNGS MEETING HELD ON 06/04/22 – CTAGL(M)(22)01 and CTAGL(AP)(22)01**	
2.1	The Minutes of the previous CTAG Lungs meeting held on 06 April 2022 were accepted as a true and correct record with the following amendment: • Item 4.2 - R Burns is the new co-Chair of CTAG Patients Group and not a lay member as stated.	
2.2	The Action Points from the previous CTAG Lungs meeting on 06 April 2022 were discussed as follows:	
2.2.1	**AP1: Lung Referral Proforma** – M Carby reported that he has been able to resurrect the project with the previous IT provider used by Harefield who have informed him that the lung referral proforma will be the next project they undertake.	**Ongoing / M Carby**
2.2.2	**AP2: Clinical Governance –** At the previous meeting D Manas reiterated that communication needs to be consultant to consultant and has written to retrieval surgeons regarding communication issues.	**COMPLETE**
2.2.3	**AP3: Automated UK Donor Lung Allocation Tool/Newcastle Study:** *See Item 8*	**Ongoing**
2.2.4	**AP4: Clinical Governance Report:** A Ali will share changes to quality and monitoring in the Health and Social Care bill with R Burns.	**COMPLETE**
2.2.5	**AP5: Shared Learning from Recent Harefield CUSUM Trigger:** A new way of sizing patients has been put in place using TLC. All centres also confirmed that anaesthetic assessment takes place pre-operation although each centre does this differently. All agreed previously to email J Parmar and D Gardiner with details. No further information has been received.	**COMPLETE**
2.2.6	**AP6: Donor Lung Utilisation by donor type and higher-quality donor status – national figures:** The line graphs in the report are split by donor type (DBD/DCD) and higher quality donor status. It was requested that the graphs split by higher quality donor status are split into two separate graphs. S Rushton to look at separating the higher quality donor graphs into two separate figures	**Ongoing / S Rushton**
2.2.7	**AP7: Allocation Zone review:** It was agreed previously that a further document would be circulated to clinical leads indicating the 24 hospitals that will move to new allocation zones.	**COMPLETE**
2.2.8	**AP8: Summary of Adjudication Panel Appeals** – It was previously agreed that there is a well-structured proforma for heart appeals and an equivalent for lung appeals would be beneficial. The proforma is now changed and this is to be discussed with Clinical teams.	**COMPLETE**
2.2.9	**AP9: Selection and Allocation Policy Updates:** S Rushton has removed the requirement for super-urgent patients to have previously been on the non-urgent or urgent scheme from POL231	**COMPLETE**
2.2.10	**AP10: Workplan/Strategic Aims** – It was suggested that electronic referrals could also be added to the workplan. J Parmar will discuss the work done to date and future work with M Carby	**Ongoing / J Parmar**
2.2.11	**AP11: Workplan/Strategic Aims** – No further responses have been received regarding ideas for the workplan.	**COMPLETE**
2.2.12	**AP12: Review of CTAG Lungs Terms of Reference** –The ToR have been finalised and are awaiting upload to the NHSBT website.	**COMPLETE**
2.2.13	**Update from RAG: MV and CT sequence of offering –** Following A Butler's request that requests for laparotomy for multi-visceral patients are done prior to any CT intervention this has now been discussed and agreed at both CTAG Hearts and Lungs meetings and by CT Centre Directors.	**COMPLETE**
2.2.14	**Signet Study** – This study was also discussed at CTAG Hearts 18/05/22	**COMPLETE**
2.2.15	**Process for Urgent heart Lung Adjudication -** It is agreed that J Parmar and R Venkateswaran will look at a more streamlined process alongside S Rushton. This has now been discussed and it was agreed to keep the current process.	**COMPLETE**
3.	**HIGH PRIORITY ITEMS**	
3.1	**Lung Performance Report - CTAGL(22)23**	
	D Gardiner presented a performance and activity update circulated prior to this meeting which will become a regular item at CTAG Lungs meetings. • Lung transplant rates in this calendar year have still not reached the previous rates for 2020 and 2021. From a year-to-date perspective, there have only been 36 transplants between April and September which is a concern. Other countries are also finding it hard, but the UK is unusual in having an established transplant programme where the lung transplantation rates are less than heart rates. • Although donor numbers have remained reasonably stable, lung transplants have dropped, and the gap has grown as time has gone by. The biggest drop has been in DBD transplants. • Comparing the current year to the previous year, offering is down 14% and when compared with the pre-pandemic period (1.4.2019-4.9.2019) it is down 25%. • In conclusion, both offering and utilisation of lungs are adversely affected. The meeting discussed some of the issues that are affecting centres and support needed:	

	• Although the infrastructure is there in centres, there is a shortage of surgical and other staffing. Lung transplant colleagues work in small teams so any change or loss of a team member can completely change the output of a centre. • Logistical challenges mean it is not always feasible to accept more than one offer at a time. If a heart is accepted, this commits the team to that transplant. Even if the heart does not proceed, the lung offers that came in during the same period cannot progress. However, there has been a 30% increase in heart transplant activity since pre-pandemic, so logistical and staffing issues are not the only reasons for the decline for lungs. • ICU capacity is an issue. • Work is being done to see whether there has been a drop in the number of high-quality lung offers. • New drugs and shielding have helped CF and COPD patients. However, despite a reduction in the waiting list of 20-30% nationally, there is still an unmet need and high waiting list mortality. • Re-configuration of transplant centres was considered in 2019. From a commissioning perspective, a service doing only 2-3 transplants in a 6-month period may not be viable and patients may prefer to go to a centre where a larger volume of transplants are undertaken. Surgical competency is also affected when a low number of transplants are undertaken. • The increase in DCD donation has an impact on the number of lung transplants. • Low activity may increase the CUSUM signal rate making centres less likely to undertake surgery that presents too much risk.	
3.2	**Lungs Turned Down in favour of Heart Transplantation** CTAGL(22)24	
	N Onwuka presented this preliminary analysis (circulated prior to the meeting) which examines concerns that centres are unable to accept lungs when a heart has already been accepted for transplant due to lack of resources. Within the period 1 January to 30 June 2022 there were 22 instances where higher quality lungs were declined due to capacity constraints within 24 hours of the centre accepting a heart. This relates to 20 donors of which 11 were not utilised for lung transplantation, (approximately 2 higher quality donors not used per month). The meeting discussed the following: • Accepting good transplant opportunities would have increased lung transplants by 50%. • In 50% of cases, the heart transplant that blocked the opportunity for a lung transplant did not progress which is a lose-lose situation. • There is a possible disadvantage in the order in which hearts and lungs are offered and this should be a focus in future. The cause of this is the large urgent heart waiting list and it was discussed that increasing the urgent lung waiting list would bring greater awareness of these patients. • It was suggested that missed opportunities where there are high-quality donor lungs declined due to capacity constraints and there is a suitable recipient should be designated a 'Never' event to focus attention on this issue. Such issues should be highlighted to Chief Executives of a Trust. **ACTION: R Baker to discuss potential for 'Never' events with D Manas** • The 10-degree fridge could allow centres to schedule transplants more easily. *(See Item 10.4)* • One way to refine the analysis is to remove those where the capacity reason was secondary to focus on cases that should be investigated in more detail. • It was suggested that KPIs could be set for organ utilisation at centres. If money is linked to activity there may be positive changes. • It was agreed that CTAG Lungs has an important role to set out the process that should be followed for lung transplantation and to raise this within trusts. V Gerovasili will provide an update on the pilot project of informing centres about higher quality lungs that are declined for named patients due to donor or organ reasons (*see Item 7.2*).	**R Baker / D Manas**
4.	**MEDICAL DIRECTOR'S REPORT**	
4.1	**Developments in NHSBT**	
	In D Manas' absence, D Gardiner stated that • Overall donation numbers are 2.8% up on last year, but still down 7% from the pre-COVID period. Kidneys and livers are holding up and hearts have increased. • The joint NHSBT/BTS Congress will be in Edinburgh on 1, 2 and 3 March 2023. It is hoped to highlight lungs at this. • A joint course run by Vienna and Toronto for new clinical colleagues interested in lung transplants was highlighted. D Gardiner offered to ask organisation committees in individual units for funding for this to inspire new colleagues to do lung transplants.	

4.2	**New appointments**	
	No new appointments were discussed	
5	**GOVERNANCE REPORT**	
5.1	**Clinical Governance report** – **CTAGL(22)40**	
	The report was circulated prior to the meeting. There are about 50 incidents per month for all organs. Two incidents were highlighted affecting lungs: • A donor was found to have TB. A formal radiology report had not been done as an initial chest x-ray transmitted to the implanting team appeared OK. However, a tubercular nodule was then found. This case will appear in Cautionary Tales in future. • Three errors on ABO recently were highlighted that were noticed before they caused any issue. The most recent case however, involved a donor of a liver and two kidneys following a traumatic death where the blood group was misidentified as O when the donor was B. There were 3 recipients. One kidney rejected after 24 hours and had to be removed. The others have had to have treatment. This is the first case where the wrong blood group organs have been given to patients and will be discussed at RAG on 11 October. There will also be a further discussion with the two commissioning organisations and the trusts.	
5.2	**CUSUM Monitoring of 90-day outcomes following lung transplantation – CTAGL(22)25**	
	There has been one signal detected since the last CTAG meeting at Harefield, but this was against their centre specific rate rather than the national rate and so does not require a formal investigation	
5.3	**Group 2 Transplants**	
	There were no Group 2 Transplants to report	
6.	**OTDT HUB UPDATE**	
6.1	**Performance Dashboard – CTAGL(22)26**	
	• The dashboard circulated shows the decline and offer time compliance for each centre, ie the number of offers received where there was a reply to Hub Operations within the 45 minutes allotted time or 45-60 minutes. In CT there are several offers that go over 75 minutes. It was commented that the discontinuation of Group Offering may improve offer response timeliness. • Return rates for HTA-B forms are also included on the dashboard. Units can use the donor IDs tab on the dashboard to search results by centre. Improves returns on the 3-month forms which are used for CUSUM would remove a manual process that has to be performed when forms are late. • This dashboard is circulated monthly.	
6.2	**Super Urgent Liver Pathway – CTAGL(22)XX**	
	The pathway has been in place for 9 months. • 93 livers have been offered via the pathway where at least one CT organ has been utilised or offered. • The median time from registration in the Hub to NORS mobilisation is 8 hours versus 5.5 hours when no CT organs are being offered. Utilisation of the super urgent pathway has trimmed the offering down by an hour making an average of 6.3 hours. • There is no difference in utilisation when the super urgent pathway is used. • Every case that is utilised is reviewed by a clinical group to share good practice and to identify development issues. Issues that have arisen include: • Significant delays in concluding block/group offers. Where centres do not go back to Hub Operations within 2 hours, the gains of sending out a group offer are lost. • Delays sending the block offer out and continuing with named patient offering has occurred in 89 cases reviewed. • CT centres initially offered and accepting a block offer later turned down the offer on 36 occasions • Delays in centres making decisions to accept/decline CT organs greater than 30 minutes beyond the block offer closure time occurred in 5 cases. Direct communication between the CT and liver accepting consultants may have improved this. • There were 5 occasions when extra time was requested in the pathway that was not pre-planned and that has caused problems for later in the process. • There have been 4 occasions where the NORS teams have refused to muster causing delays of longer in the pathway greater than an hour. The group was asked to consider: • Giving a firm 'Yes' or 'No' when a group offer is made for a super urgent group offer. • Identifying any delays early in the pathway.	

7	LUNG UTILISATION	
7.1	<u>**Donor Lung Utilisation – national figures**</u> **– CTAGL(22)39**	
	This report was circulated prior to the meeting and will be presented at each meeting to identify any high-level trends in heart and lung utilisation. While utilisation of DBD and DCD hearts has increased over recent years, the opposite is seen for lungs. Utilisation of higher quality lungs is less than 50%. It is hoped to present more centre specific utilisation data in future. There was a suggestion that using a statistical process control chart to track this data would allow statistically divergent trends to be identified.	
7.2	<u>**CLU update**</u>	
	At the last CTAG meeting, one of the higher quality donor criteria proposed by the CLU group was less than 20-pack year smoking history. However, in the period April to September, out of 176 lung donor offers, information was missing in 49 cases and so could not be calculated. An adjustment has been made to assume that if a donor is less that 30 years old and the data is missing, they will be classified as less than 20 pack years. However, even allowing for that adjustment, one third had the information missing. It was agreed that further education is needed for the SNODs on this point. An update was given on the Organ Decline schemes: • Between 1 April and September, 4 higher quality lung donors were accepted for an urgent or super urgent recipient and then declined by the centre before being transplanted by another centre, and 12 higher quality lung donors were declined and so not retrieved that would have matched an urgent or super urgent patient. • It would help to collect TLC ranges nationally so that there is more understanding of when higher quality lungs would match recipients, particularly as there are very small numbers of named patient offerings. **ACTION: V Gerovasili to write back to centres, Chief Executives and J Parmar as CTAG Lungs Chair regarding the issues above** • It was agreed that reporting of smoking data is very important and should be expanded in future to include vaping history. Dose and year are collected but is not mandatory and not necessarily updated as part of the minimum data set. A decision on what is required for smoking history is needed. V Gerovasili also reported that there is no funding this financial year for local CLUs who have been asked if they will continue pro bono in the short term and it was agreed that it is important to emphasise to them how valuable their work is even though there is no payment for the role.	**V Gerosavili**
7.3	<u>**Organ Utilisation Programme Update**</u>	
	• As the programme is currently unfunded, resource to carry out activity is limited. The plan to report on any cases that meet the lack of resources criteria has stalled due to lack of resources within NHSBT. • ARCs - Lungs and Liver are the two organs that are ready for a physical ARC, so work is underway to establish protocols, policies, governance and infrastructure. Establishment of a devolved ARC is also planned to share learning and best practice. • The International Organ Utilisation Collaborative meets next month to share learning and to consider ways to work collaboratively. • The Organ Utilisation Conference will take place in Spring next year and it is also hoped to hold another Lung Summit.	
7.4	<u>**Organ Utilisation Group Update**</u>	
	• The Organ Utilisation Group report is awaiting ministerial approval and agreement on funding. The amount of money required not need sign off from the Treasury, so once there is approval it is hoped linking in with other organisations for some areas of the plan will reduce costs. • C Williment stated that she is also working with the DoH to establish an oversight group to oversee implementation.	
7.5	<u>**Audit Fellow Project – Final Results**</u> **– CTAGL(22)27 Start at 2:01**	
	G Hardman presented the final report for her research during her role as Cardiothoracic Clinical Fellow focussing on lung utilisation which is outlined in the paper circulated prior to this meeting. In summary, the UK Lung Risk Index (UKLRI) is an additive scoring system: • Devised using logistic regression analysis of the UK lung transplant population • Based on donor and recipient variables, readily available at the time of donor offering • Used to predict Grade 3 PGD and 1-year survival for adult, first time, lung-only recipients Results of the study are shown in the report circulated to the group. In conclusion, current practice in lung utilisation appears almost random, according to UKLRI risk prognostication. In a 12- month period, 55% of candidates had at least 1 low risk UKLRI score combination. During the same period, 37% of transplants performed are considered higher risk by UKLRI score. It was noted that double the number of lung transplants could have been done last year with low-risk outcomes. However, only lungs utilised were counted and not those not utilised.	

	G Hardman was thanked for the huge amount of work she completed. In Spring 2023 the plan is to present *UK Clinicians' experiences of heart and lung utilisation decision making; a qualitative interview study.*	
8	**LUNG ALLOCATION**	
8.1	**Lung Allocation Working Group (01.09.22)** – **CTAGL(22)28**	
	The remit of this fixed term working group is to examine the opportunity to improve equity of access, transparency and efficacy of the allocation of donor lungs to patients on the routine list. Additional benefits of this new system would be the expectation that there may be an improvement in donor lung utilisation and a reduction in the waiting list mortality. The paper circulated summarises the discussions of this working group and particularly whether: • • there is currently sufficient data collected and is this the right data. Centres were asked what additional data they would like to be collected to allow better predictors of waiting list mortality and post-transplant outcomes. • The focus should be on transplant benefit. The list of data to be collected in addition to currently collected data is listed in the paper circulated along with data to be removed from the current form. It was suggested that more thought is needed on the level of detail for some of these areas rather than giving a simple yes or no answer, eg for coronary artery disease: • Is it present? 'Yes' or 'No' • If 'Yes', is it single or multi-vessel disease? • Has there been a coronary intervention (like a stent) Oxygen requirement has also been a missing requirement and it would be useful to know if it is free flow, is it free face mask, is it being streamed in via an IV at the same time. It is noted however, that data currently being returned to NHSBT is not complete. At present, data is collected at the time of registration, but it is also important to know the trajectory of the patient's condition. Any proposals will require an IT change which will not happen quickly.	
8.1.1	**Analytical Hierarchy Questionnaire**	
	S Kennedy gave a presentation illustrating his work simulating lung allocation policies and the analytic hierarchy system. The aim is to predict what the impact would be if the lung allocation policy is changed. In summary: • The simulation engine allows policies to be simulated and evaluated according to 5 metrics of interest (minimise waiting list, minimise wait list deaths, maximise post-transplant survival, maximise net benefit, maximise relative benefit) • The analytic hierarchy process allows the relative importance of the metrics to be measured. • To look at potential trade-offs between metrics, a survey consisting of 10 questions to be circulated and returned in a 3-week period is being considered. The timescale will be agreed in the working group. • Ultimately, the policy that achieves the most important goals will be identified. S Kennedy was thanked for an enormous amount of work. It was agreed that both patient and lay member input would be useful. **ACTION: S Kennedy to liaise with R Burns regarding patient input in the survey.**	**S Kennedy / R Burns**
8.1.2	**AI Work Cambridge – Lung Allocation**	
	J Parmar described the project he has been working on with the AI Centre in Cambridge using the same data as S Kennedy to see whether machine learning can help with policy decisions. At present, this project is about a year behind the work undertaken by S Kennedy. It is hoped this will take more shape in the coming 6 months. Once there is a final product from analytical hierarchy and machine learning there will be shadow analysis to see which metrics perform best. The aim is to complete the work of the working group by April.	
8.2	**Super Urgent Lung Monitoring Report** – **CTAGL(22)29**	
	The super-urgent and urgent lung allocation schemes were introduced on 18 May 2017 and ECMO was commissioned as a bridge to transplant in July 2021. S Rushton presented outcomes of patients on the transplant waiting list, considering urgency group, centre and disease group. It also presents post-transplant outcomes by urgency group. The period covered is 18 May 2017 to 31 July 2022 and results are shown in the paper circulated prior to the meeting. It was agreed that it is important to understand the impact the introduction of the bridge to transplant policy has had which is difficult given the small numbers. Complications on ECMO and quality of life 3 months post-transplant are not currently covered because the data is not available, but the super urgent tier is performing well, and to date 25 patients have received transplants quickly through the scheme. **ACTION: It was agreed that S Rushton would look at longer term survival by urgency group in the next report in Autumn 2023 and also look into survival from listing.**	**S Rushton**

8.3	**Introduction of Super-Urgent Heart Lung in Allocation Sequence**	
	A recent case highlighted the need to register someone for super-urgent heart lung allocation. The process needs to go to the appeals committees for both heart and lungs for approval. At present, super heart lung has been dealt with on a 1 case basis rather than being written into the policy and has not been thoroughly tested yet. If this is to be a requirement that both heart and lung communities want, there needs to be more testing to formalise it into a policy. There also needs to be agreement about the priority a super lung only patient would have compared with a super urgent heart lung patient. It was agreed that while such cases are exceptional, it is important to write details of who takes priority into the allocation policies.	
9	**STATISTICS AND CLINICAL RESEARCH REPORTS**	
9.1	**Summary from Statistics and Clinical Research – CTAGL(22)30**	
	This paper is an update on recent work including the annual cardiothoracic report which will shortly be published on the website. Work is ongoing on the annual report for mechanical circulatory support related to heart transplantation. The group was reminded that the risk communication tools are available on the NHSBT website to produce patient specific estimates of waiting times and post-transplant outcomes. The report includes a list of the members of the Statistics team who work on specific organ areas, details of journal publications in development and a few national applications for data from external researchers. Current and future work across areas of cardiothoracic transplantation is also described. A Fisher commented that the collaboration between NHSBT and G Hardman and S Kennedy has been very productive and updated the group on recruitment of a new clinical research fellow who will be working under the NIHR funded Blood and Transplant Research Unit in Newcastle on PROMs and PREMs. This will be across both abdominal and cardiothoracic organs. There is also a fellow visiting from Paris who will be working with UK and French data focussing on pulmonary hypertension.	
10	**STRATEGIC DEVELOPMENTS FROM THE CHAIR**	
10.1	**Workplan/Strategic Aims – CTAGL(22)31**	
	At the last meeting in April, J Parmar asked for any new initiatives that might better inform the strategy. At present, the focus is on improving lung utilisation, donor utilisation and quality of life measures through the BTRU. It was noted that because of the pandemic it has not been possible to implement some of the areas agreed at the lung summit in 2018.and it is hoped there can be some focus on this too.	
10.2	**QUOD Update** – **CTAGL(22)32**	
	J Hunter, an abdominal surgeon working with R Ploeg and S Cross on clinical co-ordination of QUOD at Oxford introduced himself to the meeting. QUOD now has over 6000 donors and nearly 120,000 samples. Nearly 36,000 items have been issued for research programmes and 60 applications for research have been approved. BAL data was shared with the meeting. In 2019-20 there were 1015 samples per month. This dropped during the pandemic and remains low despite clear instructions that collection could re-commence post-COVID. It was suggested this may be a training issue or retrieval teams don't remember to do this. **ACTION: J Parmar to cascade the need to do collection at the Retrieval Advisory Group.**	**J Parmar**
10.3	**Introduction of CT Pharmacist to CTAG Lungs Group**	
	J Parmar suggested that he would like to include a CT Pharmacist to CTAG Lungs to make the meeting more multi-disciplinary. It has been agreed that this can be trialled for 2 years from the next meeting in February.	
10.4	**10-Degree Fridge**	
	J Parmar highlighted a paper from Toronto that was published in Transplantation Science looking at how donor organs can be preserved in a specific 10-degree fridge rather than on ice. Five successful human transplants were completed with no PGD issues and good outcomes to 90 days. The fridge is commercially available but would need to be imported into the UK. Details of the fridge are circulated with these Minutes. If centres in the UK would like to use it, a bid could be put together to get funding. The cost is $1800 to get a fridge in working order in hospital. A significant advantage would be that 2 transplants could be done in sequence, and this may improve lung utilisation and numbers of transplants.	
10.5	**Future CTAG Lungs meetings**	
	For the coming 2 years, it is planned to hold 3 CTAG Lungs meetings (2 shorter, perhaps themed meetings and 1 longer meeting) and to move away from having 2 long meetings per year. One meeting will be face to face and it is hoped this new pattern will enable the group to be more responsive to issues that arise. In 2023 there will be a virtual meeting in February, a face-to-face meeting in June and another virtual meeting in November (dates are shown at the base of these Minutes).	
11	**REPORTS FROM RELATED GROUPS**	
11.1	**Retrieval Advisory Group Update (Next meeting 11.10.22)**	

	The next meeting is on 11 October 2022 and is face to face at Coram Campus in London from 10:30 am.	
11.2	**CTAG Patient Group 22.06.22 – Next meeting 07.12.22) – CTAGL(22)33**	
	R Burns reported that he has established a formal proforma to highlight issues that are important to patients. This goes out to patients, support groups and charities. R Burns also stated that he now engages with 22 different charities and stakeholders involved in heart and lung transplantation and that he is working on a workstream with L Stamp on improving information on the NHSBT website about support groups and contact details for transplant centres. Further details from the Patient Group meeting on 22 June are in the Minutes circulated prior to this meeting.	
11.2.1	**Psychology Support for CT Patients – CTAGL(22)34**	
	Patient feedback indicates that excepting patients in Glasgow and Manchester, many patients do not feel their psychological needs are being met by their transplant centres and this impacts on their quality of life. Details of the results of this feedback are shown in the paper circulated prior to this meeting. M Carby reported that Harefield has a 0.7 time psychologist, but there are problems with recruitment despite an advert being open for some time and resources and funding being unchanged. S Watson also highlighted that there is a dashboard for CF which includes a measure about availability of psychological support.	
11.2.2	**Routine Bloods for CT Patients – CTAGL(22)35**	
	This fixed term working group has been set up because of patient concerns around organising routine blood tests outside clinic appointments as part of their immunosuppression regime. Many patients live a long way from their transplant centres and sometimes travel over 200 miles to have a blood test done. Most patients have their blood tests done elsewhere and samples are sent to the transplant centres often in packaging that is not compliant with Royal Mail guidance. There are challenges across the whole process from ordering and booking tests to getting results back. Patients also reported that if they miss a test nothing happens. At the first meeting it was agreed that centres should look at finger prick testing which appears to have high satisfaction levels and that tests should take place as close to the patient as possible.	
11.2.3	**Routine Bloods Working Group Background – CTAGL(22)36**	
	This was circulated to CTAG Lungs members for information	
11.2.4	**Patient Survey Summary – CTAGL(22)27**	
	This was circulated to CTAG Lungs members for information	
11.3	**CT Centre Directors' meetings (most recent 02.09.22) – CTAGL(22)38**	
	Meetings are held every 6-7 weeks and Minutes from the most recent meeting were circulated prior to this meeting.	
12	**FOR INFORMATION**	
12.1	**NHSBT ICT update for Advisory Groups – CTAGL(22)17**	
	This update was circulated for information prior to the meeting for information	
13	**ANY OTHER BUSINESS**	
13.1	**Date of next meeting:**	
	The next meeting will be on **Weds 22 February 2022 via Microsoft Teams.** Further information will be sent out in due course. Future meetings in 2023 are shown below.	

Date of next meetings

CTAG Hearts Meeting – Weds 9 November 2022 – 10:30-15:00 – Wesley Hotel, London
CTAG Patients Group – Weds 7 December 2022 – 10:30-13:30 – via Microsoft Teams
CTAG Lungs Meeting– Weds 22 February 2023 – 10:30-14:30 – via Microsoft Teams
CTAG Lungs Meeting – Weds 14 June 2023 – 10:30-14:30 – Face to Face meeting, venue to be arranged
CTAG Lungs Meeting – Weds 8 November 2023 – 10:30-14:30 - via Microsoft Teams