Lung Transplant in HIV-Infected Patients. Single Centre Experience

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Conflict of interests

None of the authors have relationships to disclose.

BACKGROUND

HIV infection ceased to be an absolute contraindication for lung transplantation (LT) in 2015 (1).

For HIV+ patients, a LT can be considered when undetectable HIV-RNA, and confirmed compliance on combined anti-retroviral therapy.

Data for LT in HIV patients is scarce worldwide, and absent in our country.



STUDY'S DESIGN

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VARIABLES

Demographic and baseline features.

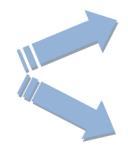
CD4 count and HIV viral load before and after LT.

General and VIH specific postoperative complications: opportunistic infections, drug interactions and drug adjustments.



RESULTS

7 PATIENTS
SUBMITTED



6 ACCEPTED FOR LT

1 REJECTED FOR LT

5 LUNG TRANSPLANTS

1 WAITING LIST



BASELINE FEATURES

	PATIENT 1	PATIENT 2	PATIENT 3	PATIENT 4	PATIENT 5
GENDER / AGE	Male / 61	Female / 46	Male / 55	Male / 59	Male / 47
BODY MASS INDEX (Kg/m2)	19	16	25	24	22
HIV DIAGNOSIS	2018	1991	1999	1986	1994
CD4 BEFORE LT	485	439	495	470	1010
VIRAL LOAD BEFORE LT	Undetectable	Undetectable	Undetectable	Undetectable	Undetectable
CMV STATUS	IgG+	IgG+	lgG+	lgG+	lgG+
LUNG DISEASE	IPF	COPD	COPD	COPD	СТЕРН
PULMONARY FUNCTION TEST					
FVC (mL) (%)	2330 (65)	1250 (38)	1540 (40)	1550 (42)	4530 (84)
FEV1 (mL) (%)	2150 (76)	400 (15)	580 (19)	590 (20)	3210 (75)
DLCO (%)	19	NA	42	NA	78
6mWT (m)	90	120	300	210	420
PULMONARY					
CATHETERIZATION					
PAP (s/d/m)	24/7/16	NA	38/28/21	42/18/28	97/44/65
PCWP (mmHg)	6	NA	15	18	7
RPV (Wood Units)	1.7	NA	2.9	2.3	17
Cardiac output (L/min)	5.76	NA	5.46	4.33	3.7



LT OUTCOMES

	PATIENT 1*	PATIENT 2	PATIENT 3	PATIENT 4	PATIENT 5
LT DATE	22.12.2018	20.01.2019	25.07.2019	05.07.2019	15.06.2019
FOLLOW UP TIME (months)	6 months	10 months	3 months	3 months	4 months
WAITING LIST TIME (days)	40	41	72	67	1
LT TYPE	Unilateral	Bilateral	Bilateral	Bilateral	Bilateral
CARDIOPULMONARY BYPASS (yes/no)	NO	NO	NO	NO	YES
PGD (Degree)	0	0	2	0	3
PERIOPERATIVE COMPLICATIONS	ЕР	Diaphragmatic paresis	NO	Diaphragmatic paresis	Hemorrhagic shock
INFECTIOUS COMPLICATIONS	S. maltophilia	NO	H. influenza	NO	Candida krusei
DAYS ON MECHANICAL VENTILATION	2	17	25	3	36
HOSPITALIZATION LENGTH (days)	48	41	44	22	52
PROTOCOL CRIOBIOPSY DESCRIPTION	Organizing pneumonia	Normal	Organizing pneumonia	Normal	Organizing pneumonia
PULMONARY FUNCTION TEST					
FVC (mL) (%)	2210 (56)	2340 (72)	2700 (70)	1790 (49)	3540 (65)
FEV1 (mL) (%)	1970 (64)	1360 (52)	1880 (61)	1190 (41)	3010 (71)



CONCLUSIONS

LT in HIV patients is a feasible treatment.

PostLT infectious or immunological complications don't increase in this population.

First year outcomes are comparable to those of the general LT population.



