



"Immune checkpoint inhibitors in kidney transplant recipients"

Coche, Sophie ; Pieters, Thierry ; Devresse, Arnaud ; Kanaan, Nada

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Results: By now, 189 patients were included in the study. Among the patients tested, 28% were compliant and 6% non-compliant. The 45-55 age group showed the highest percentage of compliant and non-compliant patients simultaneously, 68% reported a delay with the regularly scheduled time of medication, 11% forgot from time to time their medication (memory issues). Finally, over 15% didn't know their medication's indications. Half of the patients before transplantation were active smokers. Following transplantation, 7% were active smokers including 10 former smokers and 4 new smokers.

Discussion: Among our cohort, in most cases patients were minor non-compliant (66%) and a few were non-compliant (6%). Compliance evaluation in the medical literature among heart transplanted patients shows bad performance as for Germani (1) (nonadherence: 38.5%) and Brocks (2) (nonadherence: 25%). This divergence might be explained by the different definitions of compliance and therapeutical adherence which implies an active implication of the patient towards his medications. (3)

Conclusion: Our data should be adding some adherence measurements to our current results. Furthermore, therapeutical education should be introduced in heart transplant service to enhance the patient compliance and therapeutical adherence.

O34 FACTORS INFLUENCING THE CHOICE OF NONDONOR FAMILIES IN A FRENCH ORGAN HARVESTING CENTER

S. Bouyé

4, CHU Lille, Croix, France

Objectives: Report the reasons that lead families to refuse organ donation during their close solicitation by hospital coordination.

Material and methods: A retrospective study was conducted between 2012 and 2015, including 148 (34%) refusal of organ donation among 426 patients identified in a state of brain death. A questionnaire of the family was completed for each interview. Collected data concerned patient characteristics, cause of death, description of the interview and reasons for refusal. A descriptive statistical analysis was performed.

Results: The median age of patients was 50 years with a sex ratio of 1.4 men to 1 woman. The most common reason for non-donor family was the desire to maintain the integrity of the body of the patient (28%) followed by a religious order pattern (11%), brutality and suddenness of death (9%), the denial of death (6%) and early age of the donor (5%). In 39% of cases, the family said that the donor had expressed a written or oral refusal in his lifetime.

Conclusion: A better understanding of the reasons leading to the refusal of non-donor family could provide assistance to the medical team on actions to general public with the aim to reduce the refusal rate.

O35 IMMUNE CHECKPOINT INHIBITORS IN KIDNEY TRANSPLANT RECIPIENTS

S. Coche¹, T. Pieters², A. Devresse¹, N. Kanaan¹

¹Néphrologie, Cliniques Universitaires Saint-Luc ²Pneumologie, Cliniques universitaires Saint-Luc, Bruxelles, Belgium

Introduction: Immune checkpoint inhibitors (ICIs) have emerged as powerful tools in the management of advanced cancers. As they stimulate immune responsiveness, their use can be difficult in kidney transplant recipients (KTR) under immunosuppressive therapy.

Methods: We describe the clinical course of a KTR with metastatic lung cancer treated with ICIs.

Results: A 56-year-old man was transplanted with a kidney from a deceased donor in 2014 for end-stage renal disease secondary to cholesterol embolization syndrome. His immunosuppressive treatment included tacrolimus, mycophenolic acid (MPA) and methylprednisolone. In 2015, he was diagnosed with stage IV non-small cell lung cancer (cT4N3M1a). MPA was discontinued and chemotherapy with pemetrexed and carboplatin was initiated in October 2015. After an initial partial response, the disease progressed, justifying second-line chemotherapy (docetaxel and nintedanib) in June 2016 that failed to induce a significant clinical response. A third-line treatment with nivolumab, a monoclonal antibody against the programmed cell death 1 (PD-1) receptor was considered. The risk of acute rejection and graft loss was discussed with the patient. Tacrolimus was switched to everolimus and methylprednisolone dose was increased. He received five cycles of nivolumab. His renal function remained stable during the treatment. Unfortunately, an unfavourable oncological evolution after the fourth cycle of ICIs was observed that led to reinstitute chemotherapy with pemetrexed and carboplatin. Subsequently, a significant regression of the disease was noted. The patient is still alive in June 2017, with a good performance status (ECOG 1).

Conclusion: Our case shows that although there is a risk of acute rejection, ICIs can be used in KTR after adjusting immunosuppression. The late favourable oncologic response might be a delayed response to the anti-PD1 but this remains to be investigated.

O36 FEVER AFTER KIDNEY TRANSPLANTATION: A PROSPECTIVE STUDY

R. Vial¹, A. Corthier², M. Gully², C. Lombardir², R. Purgus², T. Legris², V. Moal¹

¹Aix-Marseille Univ, AP-HM, Hôpital Conception, Centre de Néphrologie et Transplantation Rénale; ²AP-HM, Hôpital Conception, Centre de Néphrologie et Transplantation Rénale, Marseille, France

Introduction: Infections remain the second determined cause of mortality after kidney transplantation. Our objectives were to describe the frequency and the reasons of hospitalizations for fever after kidney transplantation.

Methods: It was a one year's prospective study. Included kidney recipients were hospitalized for fever higher than 38°C. Classical clinical parameters, risk factors and history of fever were collected. The etiologic diagnosis was supported by the results of microbiological and/or radiological analyzes.

Results: One hundred and twenty-nine hospitalizations for fever in 102 patients were analyzed. Infections were the cause of fever in 97% of cases. Acute urinary, respiratory and digestive infections accounted for 51%, 20% and 7% of events, respectively. Cystic infections and CMV diseases accounted for 5% of events, respectively. Two skin infections, 1 deep surgical site infection, 1 endocarditis and 1 central nervous system infection were diagnosed also. The 4 cases of non-infectious fever were associated with microcrystalline arthritis, acute graft rejection and myocardial infarction. For 96 events, 73 bacteria, 22 viruses, 1 fungus and 1 parasite were documented. Twenty-eight septicemia were recorded. In 6 cases of isolated fever of infectious origin, no microbiological documentation was obtained. Two deaths occurred during the study.

Conclusion: In our study, fever was a frequent cause of hospitalization after kidney transplantation and was associated with death in 2% of cases. Infection is the most frequent cause of fever and a microbe has been identified in 81% of cases of infection.

O37 POLYOMAVIRUS INFECTION AFTER RENAL TRANSPLANTATION

W. Sahtout¹, R. Boukadida¹, L. Ajmi², A. Azzabi¹, S. Kacem², S. Mrabet¹, F. Sabri¹, Y. Guedri¹, S. Toumi¹, A. Fradi¹, S. Ben Amor¹, D. Zallema¹, I. Fodha², A. Trabelsi², A. Achour¹

¹Département de Néphrologie, Dialyse et Transplantation Rénale;

²Laboratoire de Virologie, CHU Sahloul, Sousse, Tunisia

Introduction: Human polyomaviruses (BK virus and JC virus) are ubiquitous viruses. Polyomavirus (PyV) infection, which is frequent in transplantation, is often asymptomatic. This infection is burdened with a major risk of graft loss. The aim of our work is to describe the epidemiological and clinical aspects as well as the diagnostic and therapeutic means of PyV infections in renal transplant patients.

Materials and methods: This is a retrospective descriptive and analytical study that includes all renal transplant patients who had a PyV infection between 2013 and 2016 and who are monitored at the nephrology department of Sahloul hospital.

Results: During this period, we identified 73 kidney transplant patients with an average age of 28 years. The sex ratio of our population is 1.43. The prevalence of PyV infection is estimated at 35%. BKV was the most prevalent (18.6%), followed by JCV (10%) and co-infection by both viruses in 6% of cases. We detected 2 cases of JCV infection (viremia and viremia positive) of which one was complicated by death. Serum co-detection of 2 viruses was observed in one patient. The mean time to BKV infection was 9.8 months. Urinary viral loads ranged from less than 10¹ to more than 10⁷ copies/mL, while those in plasma were less than 10⁴ copies/mL. After confirmation of the diagnosis, the decrease in immunosuppression was adopted for all patients. The evolution was marked by the occurrence of renal insufficiency in 9 cases of PyV viremia, 6 cases of PyV-associated nephropathy (PVAN) and a case of ureteral stenosis.

Conclusion: The high frequency of this infection and its potential severity are arguments in favor of the implementation of preventive strategies, at least in those at risk.

O38 THE SPOUSE AS A SOURCE OF ORGANS IN RENAL TRANSPLANTATION

S. Lahfaya¹, A. Bouamra⁶, A. Benziane^{1,2}, A. Bougroura^{1,2}, H. Amroune³, T. Rayane⁴

¹3, service de Néphrologie CHU Beni-messous; ²2, service de Néphrologie CHU Parnet; ³5, Unité HLA Institut Pasteur d'Alger, Alger; ⁴Service de Néphrologie CHU Batna, Batna; ⁵1, Faculté de Médecine Université SAAD DAHLEB; ⁶Service d'épidémiologie CHU Blida, Blida, Algeria

Introduction: Renal transplantation is the treatment of choice for patients with end-stage renal disease. The first kidney samples were taken from living donors, the majority of which were genetically related. In recent years, there has been a diversification of the sources of grafts, in particular from the spouse.