

Advanced Articles ▼ Search Search

< Previous Article

History 🔁

Next Article >





Articles & Issues ❤

Download

77

Cite

<

Share

**Favorites** 

**Permissions** 

Editor's Picks ✓ Collections ✓ Videos

**IPITA 2021 VIRTUAL CONGRESS ABSTRACTS** 

For Authors 💙

Journal Info 💙

# 207.2: Favorable 5-year Follow Up Outcomes **After Islet Transplantation in Patients With** Type 1 Diabetes Mellitus at University of Chicago

Bachul, Piotr<sup>1</sup>; Borek, Peter<sup>1</sup>; Anteby, Roi<sup>1</sup>; Generette, Gabriela S.<sup>1</sup>; Basto, Lindsay<sup>1</sup>; Perea, Laurencia<sup>1</sup>; Wang, Ling-Jia<sup>1</sup>; Golab, Karolina<sup>1</sup>; Tibudan, Martin<sup>1</sup>; Perez-Gutierrez, Angelica<sup>1</sup>; Barth, Rolf<sup>1</sup>; Fung, John<sup>1</sup>; Witkowski, Piotr<sup>1</sup>

Author Information **⊗** 

<sup>1</sup>Surgery, Transplantation Institute, Chicago, IL, United States

Transplantation: December 2021 - Volume 105 - Issue 12S1 - p S3 doi: 10.1097/01.tp.0000804288.00839.c4

Metrics

**Introduction:** Prospective randomized multicenter trial did not find advantage of CXCR1/2 blocker (Reparixin) over placebo in islet transplantation in patients with type 1 diabetes mellitus and problematic hypoglycemia at 1 year follow-up. We present favorable metabolic outcomes at 5-year follow-up in trial cohort from our center.

Material and Methods: 12 nonuremic patients with type 1 diabetes and problematic hypoglycemia received a total 19 islet transplants (ITx) (up to 2 ITx per patient) within 1 year. Eight patients were randomly assigned and received Reparixin and 4 patients received placebo within first week after each transplant in addition to standard immunosuppression (anti-thymocyte globulin, tacrolimus, and mycophenolate).

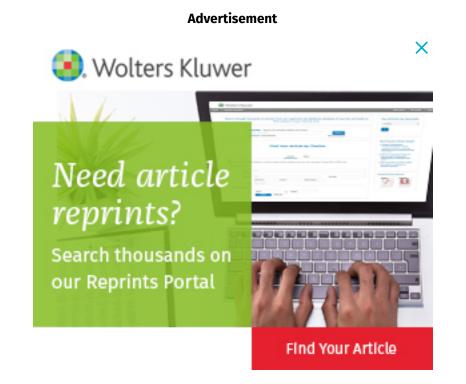
**Results:** 11/12 of patients achieved insulin independence during the study period. At 5-year follow-up 4/8 (50%) remained insulin free with HbA1c <6.0% in Reparixin group vs. 1/4 (25%) in placebo group. One patient had partial islet function without severe hypoglycemic episodes (SHEs). Diabetic neuropathy and renal function remained unchanged while retinopathy improved in 3/6 (50%) patients. 6/12 (50%) patients left the study: 3/6 proceeded with pancreas transplant and remain off insulin, the remaining 3/6 stopped immunosuppression with decline of islet graft function. No patients experienced any cardiovascular events nor became persistently sensitized (current PRA 0%).

Conclusions: Repeat islet transplantation led to insulin independence in 91% of patients. 50% of patients in Reparixin group and 25% in placebo remained insulin free 5 years after ITx. In long-term follow-up there was no progress of secondary diabetic complications. Kidney function in all patients remained stable without macroalbuminuria. No patients became persistently sensitized. Subsequent pancreas transplantation was feasible and effective in patients with decline of islet graft function.

Copyright © 2021 Wolters Kluwer Health, Inc. All rights reserved.

#### **Article Level Metrics**

There is no Altmetric data at this time...



#### **Related Links**

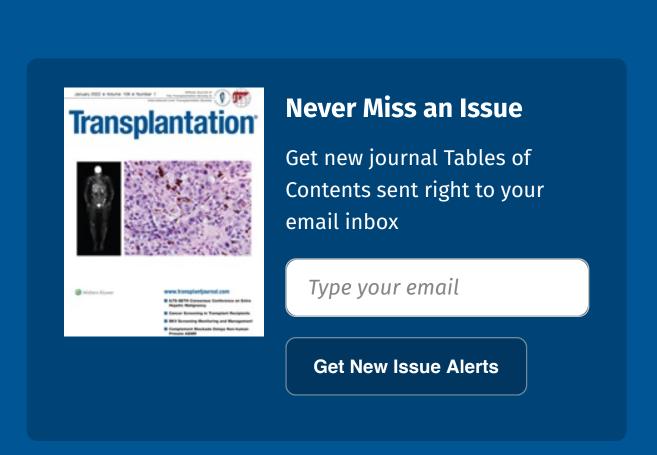
- Articles in PubMed by Piotr Bachul
- Articles in Google Scholar by Piotr Bachul
- Other articles in this journal by Piotr Bachul

#### Readers Of this Article Also Read

- SARS-CoV-2 Vaccination, Immune Responses, and Antibody Testing in Immunosuppressed Populations: Tip of the Iceberg
- Immunosuppression Regimen Use and Outcomes in Older and Younger Adult Kidney Transplant Recipients: A National Registry Analysis
- Presence of Donor Lymph Nodes Within Vascularized Composite Allotransplantation Ameliorates VEGF-Cmediated Lymphangiogenesis and Delays the Onset of **Acute Rejection**
- Murine Cytomegalovirus-induced Complement-fixing Antibodies Deposit in Murine Renal Allografts During Acute Rejection
- Fluid Management During Kidney Transplantation: A Consensus Statement of the Committee on Transplant Anesthesia of the American Society of Anesthesiologists

# **Related Articles**

**↑** Back to Top



## **Browse Journal Content**

- Most Popular
- About the Journal Current Issue
- Subscribe
- For Authors
- Past Issues
- Register on the website
- Get eTOC Alerts

## **For Journal Authors**

- Submit an article
- How to publish with us

## **Customer Service**

**Live Chat** 

customerservice@lww.com 800-638-3030 (within USA) 301-223-2300 (international) **Activate Journal Subscription** Browse the help center





