The National Library of Israel has been using Aleph (version 1!) since 1983. Since 1985 all current cataloging has been entered in to the Aleph catalog. Over the years, various parts of the card catalog were converted, particularly most of the library's core areas of Judaica, Hebraica, Israeliana and Near Eastern studies. This left some 350,000 Latin character and 19,000 Cyrillic character cards, 3,800 UN publication cards and 41,000 music cards. In 2010 it was decided to finish the retro-conversion of all remaining cards with partial outsourcing. The project includes the library's IT, foreign language cataloging and other departments. The Latin character, UN and music cards were scanned by a team from Backstage Library Works at the library. The library used the images to create a virtual card catalog accessible through the internet. The Cyrillic cards and leftover Judaica are processed at the library. The scanned images are processed by BSLW and the records are sent to the library in 7-8 deliveries of 20,000 to 100,000 records. Each batch is analyzed, local fields are added, other fields are dropped or tweaked, including links to the virtual catalog, before upload. The records are then refined by library staff according to notes added by the scanning teams and based on tests developed in the library. Holdings are added globally after upload to Aleph and/or manually during processing. This poster will present the programs developed at the library, use of Aleph and custom services to integrate the records in the library catalog. We will also discuss manual processing of each batch and processing left to do after completion of all conversion projects in the library, as well as conclusions learned from the project.