The Open Justice Broker Consortium (OJBC) is a nonprofit membership organization of government agencies and jurisdictions, dedicated to improving justice information sharing through the reuse of low-cost, standards-based integration software. The OJBC unlocks the power of open source software and cross-boundary collaboration to promote a more effective, efficient justice system.

Overview of Open Justice Broker Capabilities

**FEDERATED QUERY**

Effective decision-making at every step in the justice system requires a comprehensive view of information that breaks down agency and jurisdictional boundaries, while ensuring that only authorized users are accessing each type of information. Information from diverse sources should be well-integrated, even where no common identifiers exist, to allow users to find what they need quickly and reliably.

The OJBC federated query services provide standards-based access to virtually any justice data source, and make the information available for integration into other applications or viewing in an easy-to-use web portal. It includes an “entity resolution” function that uses sophisticated algorithms to link records likely to represent the same individual. Access to the services is secured with a federated identity approach, and supports automated privacy policy enforcement.

**CROSS-AGENCY AUTOMATION**

The justice system in any jurisdiction is—or should be—a single integrated business, where activities in one agency trigger subsequent steps in another agency. Arrests in a law enforcement agency lead to charging decisions by a prosecutor, then criminal filings in court, supervision in corrections, and so on. Too often today, the “integration” of these processes occurs via inefficient manual processes and sharing of information via paper.

The OJBC helps automate key justice cross-agency business processes—such as incident and arrest reporting, e-filing, warrant issuance and service, and sentencing—by sending standards-based electronic messages through easily configurable pathways between agencies or even across jurisdictions.

**SUBSCRIPTION-NOTIFICATION (ALERTING)**

As a companion to federated query, justice practitioners often want to know when key events occur in an individual’s interaction with the justice system. Probation officers need to know when people they supervise have contact with law enforcement; prosecutors like to know when defendants in diversion programs are arrested.

As a by-product of automating business processes, the OJBC can examine events as they occur and match information in the event against a subscription list, and notify subscribed practitioners when there is a match. The OJBC is able to maintain the subscription list via a manual subscription portal (in which authorized practitioners can manually create subscriptions) or via automation (e.g., when individuals are sentenced to probation and assigned to a probation officer, the OJBC can automatically subscribe that officer for future law enforcement contact involving that individual).

**ANALYTICS**

Effective management of a jurisdiction’s justice system rests on data that provide a comprehensive picture of how the system is performing. Ideally, this includes an understanding of who is using [or involved in] the system, the underlying factors that are motivating this usage, and what outcomes follow from this involvement. From incident and arrest counts by incident or crime type, broken down by geographic or demographic characteristics, to caseload volumes and jail populations, to participation and recidivism rates of subpopulations or program participants—there is a wealth of information typically locked up in agencies’ systems that, if properly integrated, can serve effective data-driven decision making. The OJBC includes a set of analytics tools to enable both exploratory, ad-hoc queries, as well as packaged analytical products (such as dashboards) to deliver critical operational and performance information to decision-makers who need it.

**FEDERATED IDENTITY MANAGEMENT**

As a jurisdiction makes more information resources available to practitioners, it is important that these users be able to access these resources with a single, secure credential. Having to remember multiple application logins is inconvenient for users (to the point of being a barrier to information exchange) and often creates vulnerabilities that compromise security. The OJBC follows industry best practices and guidance from the Global Justice Information Sharing Initiative in supporting a federated identity approach to user credentialing and access management. OJBC applications support federated credentials “out of the box,” as long as those credentials conform to industry and justice community standards. OJBC services that access secure data sources also check federated credentials as a first step in controlling access to the data.

**PRIVACY**

As jurisdictions share information—often making it available in new contexts and to new stakeholders—it is critical that they put in place and enforce policies to ensure that the information is accessible only to authorized users and for authorized purposes, and that any conditions and obligations related to use and dissemination of the information are strictly followed. One lesson learned from pioneering jurisdictions is that it is important to automate as much privacy and access control policy as possible, so that policy enforcement itself does not become a barrier to information sharing. The OJBC, through its support of the Global Technical Privacy Framework, enables the automated enforcement of access control rules—and with them, a great deal of the rules in many privacy policies. In addition, the Open Justice Broker Consortium members share among themselves templates, governance structures, model policies, and other resources useful in establishing effective privacy policies.
OJBC Information Sharing Accomplishments

The State of Hawaii has used the OJB to implement a federated query that provides a single point of access to the criminal history repository, bench warrants database, and county firearms registries. Hawaii has also established automated re-arrest subscriptions for probation and parole officers, as well as a manual subscription capability initially being used by prosecutors to track defendants prior to case disposition. In the next year, Hawaii plans to extend subscription-notification to incorporate Federal “rap back” services offered by the FBI, as well as law enforcement incident reporting, disposition reporting, and criminal e-filing.

The State of Maine has used the OJB to enable automated sharing of law enforcement incident reports with prosecutors and also with the FBI’s N-DEx repository. Through these services the state has contributed thousands of records to N-DEx while allowing county prosecutors to redirect clerical staff to other tasks. Maine has also enabled subscription/notification for arrest events, initially for probation officers. In the coming year, Maine plans to implement the OJB’s analytics tools and begin implementation of federated query services developed by the other states.

The State of Vermont has used the OJB to establish a federated query across all law enforcement agencies in the state, enabling statewide access to incident and arrest information. Vermont has implemented subscription/notification of law enforcement contact events, enabling automated notification to probation officers as well as the state's pretrial services program. Vermont has also pioneered implementation of the OJB analytics platform, supporting ad-hoc querying of incident, arrest, disposition, and pretrial services participation information, along with dashboards for law enforcement resource utilization, analysis of drug crime, and pretrial services implementation and outcomes. In the near future, Vermont plans to add an e-ticketing capability to the current incident reporting workflow, enabling the judiciary to receive citations electronically.

The State of Michigan, which just joined the OJBC in 2015, has begun implementing two capabilities. The first is an automation of warrant request, packing, issuance, and service among law enforcement, prosecutors, and courts. The second is a federated query among county-level juvenile court case management systems, to allow authorized judiciary staff to query for a juvenile’s information across jurisdictions. The state will initially implement both capabilities in a pilot group of counties, but will eventually roll them out statewide.

In accomplishing these goals, each of these states has reused significant portions of the OJB software originally developed by the others. Because of this, implementing these capabilities in these four states has cost less than a third of what it would have cost each of them to work independently and re-develop each of these capabilities separately.

THE BENEFITS OF OPEN SOURCE

The OJB is built entirely on open source software, which has been developed by industry and made available at no licensing cost, allowing the participating jurisdictions to save considerable time and money in building their information sharing environments. Open source software also provides robust support for justice community standards, and brings considerable security and reliability benefits as well.

In 2015, the OJBC also completed the release of all the core OJB capabilities and software under an open source license as well. (It is available on GitHub, a prominent open source release site, at https://github.com/ojb).

Because of its open source foundations, and the availability of the OJB itself under an open source license, the OJB allows jurisdictions to implement their information sharing environments much more quickly and at far less expense than with proprietary alternatives. Technical assistance and implementation services are available from OJBC staff, but jurisdictions can engage with vendors and system integrators to build components on the OJB platform as well. In the end, the national community benefits too, as jurisdictions that build OJB components share those components for use by others—and they in turn can take advantage of what others have done.

THE IMPORTANCE OF STANDARDS

The national justice community has developed a body of standards to help ensure that information exchanges are interoperable across jurisdictions. The original OJBC states embraced this vision and, from early on, committed to following national standards—and it was this decision, taken independently by these states, that was the single biggest catalyst to the reuse of information exchange software through the OJBC. The OJB now includes over five dozen service specifications that conform to the Global Reference Architecture, and the OJBC states have two statewide identity federations that conform to the Global Federated Identity and Privilege Management guidance (with Maine and Michigan soon to follow).

The OJB’s conformance to justice community standards allows other jurisdictions to leverage what the existing members have done—and further grow the OJB through additional implementations—as long as they share the same commitment to open community standards.