Customer Data Platforms

An IAB Canada Guide to CDPs

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IAB Canada Industry Paper

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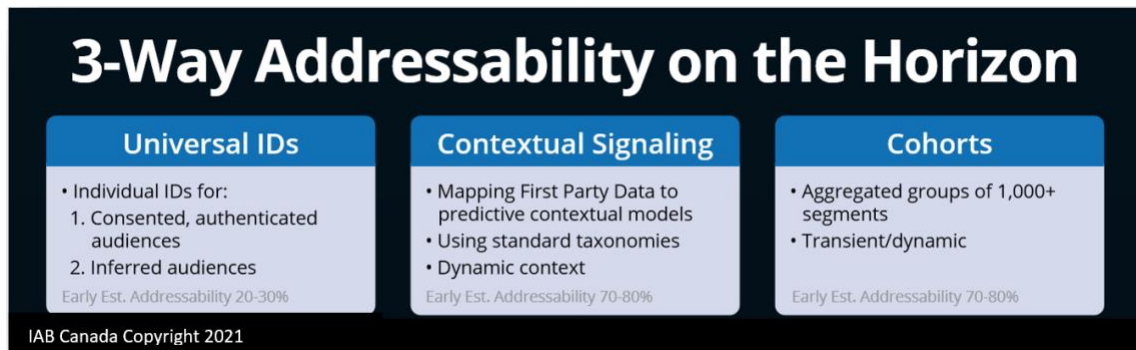# Table of Contents

Introduction

Data has fueled the digital advertising ecosystem for the past two decades. The platform economy has enabled brand marketers to run on lean data hubs, while outsourcing to third party vendors to enhance their customer intelligence from across the web. Cookie-based advertising allowed brands to run on partial data sets as the live supply chain made it possible to complete the process of acquiring potential new customers, however, the world of data-based advertising is changing dramatically.

Recent developments in the digital advertising ecosystem stemming from consumer trust issues, increasing global regulatory constraints, and shifting technical standards (most significantly, the diminishment of third-party cookies), places critical importance on all businesses obtaining, managing, and working with first party data. The demand to 'know thy consumer', anticipating their wants and needs through a direct 1:1 relationship, has never been greater. Although Customer Relationship Management (CRM) systems have done a great job at managing and storing customer interactions, today's complex datascape requires advanced tools to meet the challenges the industry faces.

With three emerging methods to address audiences on the horizon, advertisers would be well-served to organize their customer data in such a way that it is ready to interface with the new trio of methods shown below. To do this, they will need to implement advanced data management technology that offers multi-dimensional services.

3-Way Addressability on the Horizon

Universal IDs	Contextual Signaling	Cohorts
• Individual IDs for: 1. Consented, authenticated audiences 2. Inferred audiences Early Est. Addressability 20-30%	• Mapping First Party Data to predictive contextual models • Using standard taxonomies • Dynamic context Early Est. Addressability 70-80%	• Aggregated groups of 1,000+ segments • Transient/dynamic Early Est. Addressability 70-80%

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Enter the Customer Data Platform (CDP). A CDP is a progressive tool that manages large data sets with advanced features like AI and machine learning, to provide real-time insights into the customer journey.

According to the 2020 IAB: Winterberry State of Data report, expenditures on data management, processing, and hygiene solutions, increased 9.8% in 2019, driven in large by a growing emphasis on first-party data and licensed solutions like CDPs, that support in-house management of customer and prospect data.

A CDP is an essential piece of adtech that belongs in the modern marketer's tool kit as they prepare for a world without third-party cookies.

Emerging Tools in the Cookieless Toolkit

CMPs · CDPs · Contextual Signaling · Fledge enabled marketplace (Google Privacy Sandbox) · IAB Tech Lab Taxonomy & Data Label.org · SKAdNetwork - for IDFA workaround

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This industry guide has been developed by IAB Canada to explain CDPs: what they are, how they differ from other tools, and how brand marketers can leverage them to access advanced digital communications based on next generation intelligence. This document will be updated regularly as new information becomes available.

What is a CDP?

A CDP is a technology/software that can be used by marketers to better understand their organization's customers, and to scale personalized experiences across marketing, sales, and service channels.

Developed with marketing at the core of their function, CDPs allow marketers to create customer profiles which can be used to deploy customized marketing communications across multiple channels (i.e. email, Direct Mail, SMS, etc.) within a tech stack.

Over time, a well-implemented CDP can reduce cost per acquisitions, lead to higher engagement and reduce attrition rates across most categories.

CDPs have three core components:

1. **Software** – that is customizable to the needs of different businesses.
2. **Persistent Unified Customer Database** - as a consumer engages in marketing communications, alters their preferences and exhibits behaviors online (and offline), these interactions are captured and stored to help develop individualized and aggregated intelligence;
3. **Accessible to Other Systems** – given the myriad of touchpoints that exists in today's landscape, CDPs must have API access to incorporate a breadth of inputs and outputs for actioning.

Before CDPs, marketers may have utilized data warehouses. The difference between a data warehouse (which stores data and is typically managed by IT professionals) and a CDP, is that a CDP processes the stored data that exists in its raw form (data lakes) to make the raw data actionable and insightful - in this case, for the purpose of strategic marketing.

Acting as a compliment to other existing systems like CRM or DMP solutions, a CDP can integrate, aggregate, and then organize data in a less arduous, labor-intensive way, creating a singular, forever-evolving view of a consumer.

Difference Between: CDPs, CRMs, and DMPs

Though often compared, CDPs are not the same as Customer Relationship Management (CRM) systems, or Data Management Platforms (DMPs). Let's take a closer look to understand the differences between CRMs, DMPs and CDPs.

	Customer Data Platform (CDP)	Customer Relationship Management (CRM)	Data Management Platform (DMP)
Designed for	Marketing as a technology tool	Sales as a technology platform	Advertising as a technology platform
Purpose	Multi-inputs of data to understand consumers + prospects to generate insights and personalized communication(s)	Manage and update customer data	Build audiences and activate against them within campaigns
Data Collected	Typically uses first-party data, but can be enhanced with second and third-party data	First, second and third-party data	First, second and third-party data
Data Types: Known, Potential and Anonymous	Collects Known (PII), Potential and Anonymous customer data	Collects Known (PII) and Intended customer data through intentional interactions with a brand/company	Inputs include anonymized data like cookies, IP addresses, device IDs, etc.
Real Time	Yes	Yes	No
Data Retention	Retains data for longer periods of time. Data is collected in real time, allowing for data to evolve	Retains data for longer periods of time, with manual updates on data changes	Retains data for shorter periods of time

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|	**Customer Data Platform (CDP)**	**Customer Relationship Management (CRM)**	**Data Management Platform (DMP)**
Use of Customer Behavioral Data	For external purposes/uses (i.e. customer journeys)	For internal purposes/ uses (i.e. sales pipeline activity)	For external purposes (i.e. look-alike modeling)
Tracking Capabilities	Online and offline tracking	Online (mostly) though offline data can be included IF programmed	Online

Why are CDPs Important?

Allow marketers to speak to customers at all stages of the purchase cycle:

Online user experiences have become increasingly complex. Users no longer move cleanly from one stage of the purchase cycle to the next, they instead move in and out at various points and each user journey is unique. This makes it increasingly difficult for marketers to maintain a timely view of their mindsets. Additionally, the inability to access data from third party cookies requires that consumer data be organized in a way that identifies nuanced segments of consumers based on preferences, and life stages, to address them (or their cohorts) online.

"Consumer journeys have changed - attention fragmentation and compression in decision-making are putting evolutionary pressure on traditional marketing funnel evaluation criteria." ~ *IAB/PwC Digital Ad Ecosystem Report, 2021*

The Evolved Consumer Journey
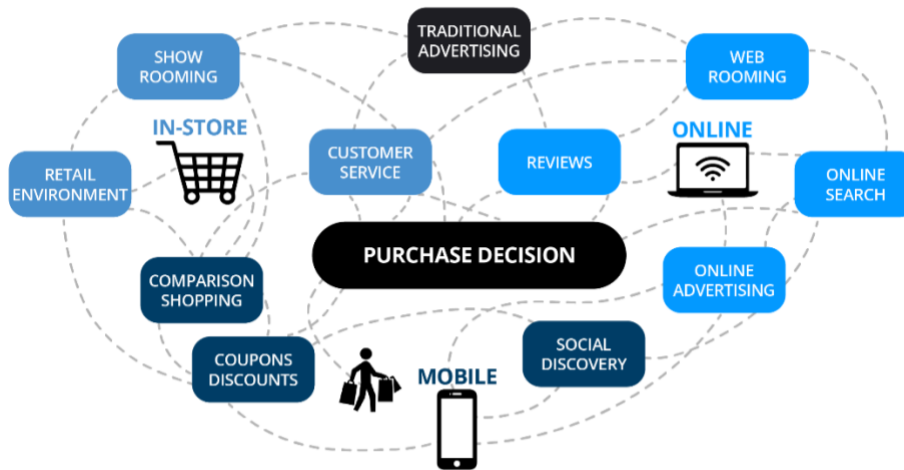
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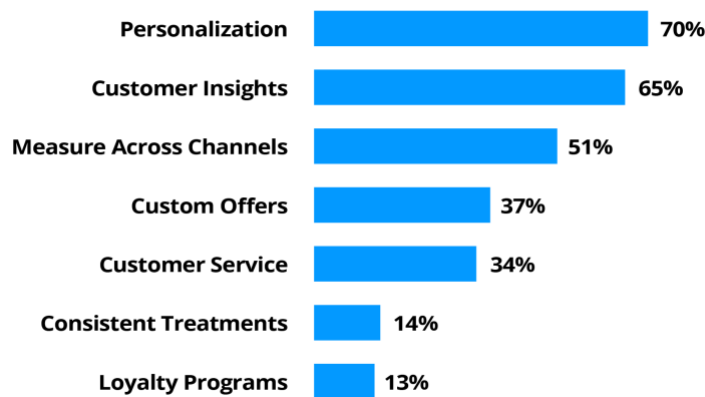
Privacy-First Personalization

Customers want to be understood by the brands they engage with across the totality of their experience, without needing to remind them who they are, and what they do or do not want. CDPs help bring the optimized user experience to life and are considered a necessary tool for the new ecosystem.

With privacy concerns being the main impetus for cookie deprecation, coupled with citizen outcry for increased transparency and consent, the third-party identifier has lost its place in the ecosystem, creating the need for an entirely new toolkit. Given that CDP software houses customer data, reliance on isolated data sets is eliminated. This means that, once consent preferences are shared, the CDP can make changes against each unified customer profile, ensuring security and compliance. When looking at the example of IAB's Transparency and Consent Framework (a signal-based technology to communicate consent preferences through the ecosystem via a marketer's consent management platform), a user's consent preferences can be another data set easily integrated into a CDP.

Brands and services that successfully acquire customers and obtain consent (either implied or explicitly) to use their data, know that consumers want to be remembered. This is a conscious behavioral choice that helps create and maintain a friendly, respectful and customized online user experience, while representing a true value-exchange.

The CDP Institute published a ranking of the key benefits of unified customer data for marketers. The top three benefits indicate that the overarching advantage is about enhanced strategic capabilities.

The Benefits of Unified Customer Data

Personalization	70%
Customer Insights	65%
Measure Across Channels	51%
Custom Offers	37%
Customer Service	34%
Consistent Treatments	14%
Loyalty Programs	13%

Source: CDP Institute, 2016

Insights generated through CDPs can provide remarkable value to marketers. Enhanced CDPs use artificial intelligence and machine learning to analyze large data sets and provide predictive modeling to allow for more responsive web design and smarter marketing tactics.

Measurement and the development of sophisticated attribution models, is an increasingly important function of the CDP. With centralized profiles connected to several external touchpoints, advertisers are armed with valuable real-time insights into ROI and ROAS.

Other key benefits of CDPs include:

- **Marketer-owned/Centralized data** – increasingly, advertisers would like to maintain all of their customer data in a centralized location. APIs help to make a centralized strategy possible by connecting to external partners selectively and as required.
- **Privacy-first** approach to collecting data directly from consumers, keeping first-party data front and center
- **Single-sourced profile** of each individual consumer across all touch points
- **Advanced segmentation** that takes into account several layers of data in aggregate
- Automation of **campaign activity in real-time**
- Ability to unify **multi-channel** traffic, delivering consistent messaging across channels (including in-app environments)
- **Elimination of data loss** and possibility of user duplication across systems
- **Predictive modeling** through AI providing a unique competitive edge

How CDPs Work

CDPs work by collecting customer identities (with appropriate consent), first party interaction data and information from third party data sources via APIs connected to its system. CDPs stitch all this data together to create a single, persistent, and evolving profile for each customer.

Types of data found in a CDP:

- **Identity Data** – authenticated information like email addresses, phone numbers etc.
- **Past Transactions** – transactional history, characteristics of purchases, inferred information on price sensitivity and loyalty information etc.
- **Behavioral** – data that is descriptive (captured by way of focus groups or through observation) and more conceptual in nature.

A CDP is also able to identify shifting behavioral patterns that might signal various actions to a brand/product. These signals can lead to several advertising activation use cases:

- Audience lists for marketing automation – custom lists that are based on first-party data insights. Segments can be created against various attributes. This is also a valuable testing feature.
- Campaign performance and ad spend optimization – end to end performance metrics helps to edit lists and develop rules around most responsive segments which creates efficiencies in media expenditure.
- Advanced real time event triggers – machine learning and predictive models can help to identify advanced "triggers" indicating optimal communication and experience opportunities.
- Real time web and mobile personalization – dynamic creative insertions and responsive web design can be a powerful tool to treat abandoned shopping carts, optimized shopping experiences and general customer satisfaction.

A CDP Use Case – Car Rental Company

To establish a more direct-to-consumer (DTC) strategy, a rental car company may leverage a CDP to increase revenue from direct bookings.

By building out real-time unified profiles that may include attributes like car preferences (color, size, make and models), occasional use of toddler car seat, location pick-up, email address, etc., the rental company is better positioned to offer individualized experiences.

The internal marketing teams consider all captured preferences, in addition to the real-time event triggers like March Break travel planning, and develop a customized experience for the consumer. The possibilities are endless and this is where marketing intelligence is highly valued. Presenting the customer with a family-friendly model (based on internal data) and creating a discount that throws in extra features and the preferred pick-up location, can create a powerful offer. Over time, perfecting these "packages" can drive significant lift in revenue and help build loyalty.

If the customer abandons the booking process, the profile can trigger media activity to help encourage return to completion. The communication may include deeper discounts or upgraded models.
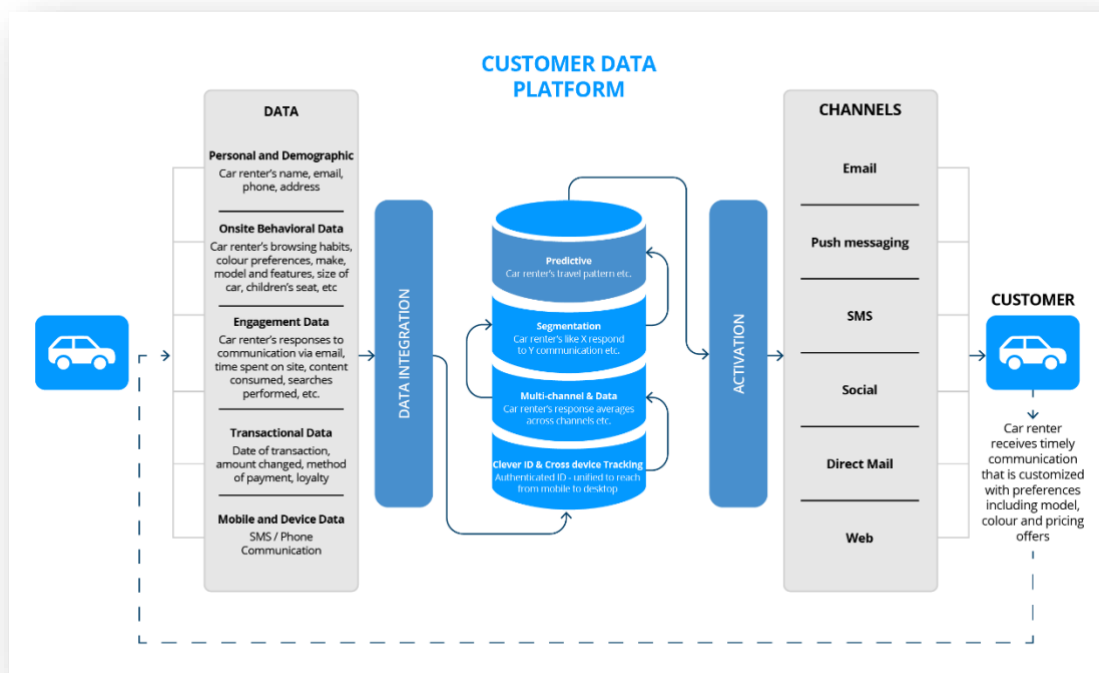
Steps to Consider when Selecting a CDP

With well over a hundred different vendors to select from, choosing the right CDP can be challenging. The following is a 6-step process to select the right CDP for your business.

Step 1: Identify the Need

A CDP can help to solve a myriad of problems (examples below), be sure to include your organizations specific needs in the RFP and be as detailed as possible.

- Customer personalization and segmentation
- Conversion and tracking
- A/B testing
- KPI optimization
- Look-alike modeling

- Maintaining consumers throughout their lifetime (Loyalty & Retention)
- Online and offline connection
- Predictive modeling to prevent attrition
- Retargeting

Step 2: Compare CDP Function and Offering

Compare vendors by taking your list of immediate needs and prioritizing them but keep scalability in mind as your needs may change once the basics are addressed.

Generally speaking there are three types of CDPs:

1. **Data** CDPs – sometimes referred to as a standalone, a data CDP works by gathering customer data (online and offline), to create a 360 view of a customer. Data CDPs also connect to other systems to create a singular view of a consumer (eliminating data silos), which can be a beneficial add-on for those who already have multiple tech systems set in place. Technically speaking, this is the minimal standard and pre-requisite to be considered a CDP, and most began as a tag management system, or web analytics platform, retaining considerable legacy business in those key areas.

2. **Data & Analytics CDPs** – building off data CDPs, these provide data processing and analytical applications. Analytical applications may include functions like: visualization features (useful if needing to communicate consumer insights to other departments like sales, customer retention or product), pre-built report functions for data analysis, revenue attribution, journey mapping, machine learning (useful when needing to process consumer behavior in real-time to optimize against consumer journeys) and predictive modeling.

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These CDPs also allow for segmentation, automating the distribution of segment lists to different departments (I.e.: marketing, sales and customer service), allowing for more advanced analytics. Predictive functions may be included that help alert certain customer activities to trigger actions across departments.

3. **Campaign Engagement CDPs** – these CDP systems include the above plus advanced features that allow for campaign optimization and execution for cross-channel marketing campaigns. Campaign engagement systems allow for the creation and specification of treatments (personalization) to be set, this allows for messaging customization and product or content suggestions through the channels to be identified as most effective for each consumer and/or segment (based on previous interactions and predictive models), while responding to changes in consumer behavior and/or their preferences, in real time.

Step 3: Implementation & Integration Inquiries

Given that CDPs are considered part of an organization's data infrastructure, confirming whether the software will integrate within current systems is paramount. Below are some questions to help get to the right solution:

- What are the integration capabilities/requirements for the current/planned marketing stack?
- Data collection inquiries: Can the CDP retain, unify, and manage all PII data? What about real-time data load and cookie management? What sort of data does the CDP collect (unstructured and/or raw data; internal and/or external data like second and third-party data)? How regularly are customer data profiles updated?
- What are the short-term and long-term budget considerations?
- What level of account management and support is required and provided?
- Is there an ability to execute multi-channel marketing campaigns?
- Are there customized dashboards available and if so, how sophisticated do these get?
- Which key stakeholder groups should be brought to the table to make a well-informed decision (remembering that data is housed and leveraged by different departments like marketing, engineering, product management)?

According to mparticle, there are a few key questions to be asking other internal departments like engineering/IT.

Key Stakeholder Questions for Engineering Departments:

1. Are there SDKs and APIs that are easy to integrate within current systems?
2. Does it provide integrations which allow for third-party vendor code to be moved from the client-side to the server-side?
3. Are there developer tools that engineers can leverage to make implementation easy and seamless within existing systems?
4. Is there documentation and tools that will allow engineers to work with the CDP independent of the vendor?
5. What is the CDPs approach to data collection and consent – how does the CDP remain privacy-protected?

Other stakeholder discussions should include legal, data, sales and customer service teams who may leverage CDPs for their own purposes.

Step 4: Conduct Demos

Take the time to fully understand the CDP platform and visual capabilities. Form a partnership prior to committing to a product. Bring the list of needs to the demo!

Step 5: Understand Costs

Consider factors such as licensing fees, set up costs, training, support, operational, and any additional services that might be considered an add-on, may be important to your decision-making process. Keep in mind that cost per records can add up, be sure to get a clear picture of what the arrangement might look like further out in time.

Step 6: Test

When testing select a scenario that would have a direct impact on profit, as small wins can act as big gains.

The Future of CDPs

CDPs continue to innovate their AI and analytical capabilities. The industry is changing rapidly and increased demand across a broad range of categories is enabling rapid advancements for this technology. Already, we are seeing sub-categories of CDPs emerge. For example. Customer Journey Platforms (CJPs) are coming on to the scene with promising capabilities that analyze real-time funnel activity providing sophisticated capabilities to marketers.

As advertisers turn their focus to more sustainable solutions that protect consumer privacy, they will need tools that still allow for complex audience insights to be gleaned and plugged into the new addressability models we anticipate in 2022 and beyond.

Though much of this document has focused on the inherent value exchange between consumers and a brand/product, of equal importance is understanding the shelf life of a singular data point. Consumers want greater transparency and control; regulators want enhanced legislation across the globe – and all roads lead to putting higher levels of responsibility on those who collect data. Thus, a singular data point remains the treasure trove of this industry – one that evolves and changes as a brand/product itself evolves and changes throughout a consumer's lifetime.

When it comes to articulating the data value exchange for consumers, CDPs provide the industry with one of the most powerful narratives. Meaningful customization of experiences and communications requires timely and accurate data. IAB Canada believes that CDPs play a significant role in the future of addressability.

We look forward to monitoring this exciting area of ad tech and will be updating this document to bring our community the latest developments and capabilities of CDPs. We will also be conducting product spotlights in the coming months to help bring the facts to life on-screen.

5 Key Take-Aways

- **Enables enhanced customer experiences –** insights gleaned from CDPs can lead to higher quality interactions with customers and ultimately loyalty. Proper implementation and use of CDPs have a direct impact on revenue.

- **Simplification and consolidation of the consumer journey – online and offline -** acts as a central data hub that connects data and other software programs together, creating a consumer-centric view.

- **Designed for Marketers and leveraged by marketing teams to support campaign and marketing analysis,** without heavy reliance on IT departments or highly sophisticated technical acumen.

- **Customer Data Platforms are an important tool in the Cookie Independence tool kit.** Personalization and hyper-segmentation of consumers can be leveraged in the new three-way addressability model.

- **Privacy compliant data management –** applying unique identifiers that protect personal information for the purposes of marketing is the way forward.

Getting Involved

Thank you to those IAB Canada members who contributed to this document. If you are an IAB Canada member and would like to contribute to our community discussions on preparing for cookie independence, please reach out to committees@iabcanada.com.

If you are a non-member and are interested in joining our community, please contact memberships@iabcanada.com.

Glossary of Terms

Term	Definition
Cohort Based Advertising	Advertising that is targeted to a set of users grouped together because of a common identifier. A cohort can be anything: from users in a certain location to users who purchased a specific product or service within the same period.
Customer Relationship Management (CRM)	A technology or software used to manage the relationship and interactions that a company has with its customers.
Contextual Advertising	Contextual advertising is a form of targeted advertising where advertisements appear on websites or other media, based on the content of a publisher using AI and/or other language elements to match likely interest and engagement with the advertisements.
Customer Data Platform	A collection of software which creates a persistent, unified customer database that is accessible to other systems. Data is pulled from multiple sources, cleaned, and combined to create a single customer profile. This structured data is then made available to other marketing systems.
Data Lakes	Data that is collected in its raw unorganized form.
Data Management Platform	A centralizing platform to collect, organize and activate first, second and third-party audience data from any source, including online, offline, mobile, and beyond.
Data Warehouse	A data warehouse stores data without processing it or establish analysis from the data.
First-Party Data	Information collected directly from publisher, brand audience or customers. It includes but is not limited to behaviors, actions or interests demonstrated across owned media channels like website(s), social media or app(s). It includes all CRM data.

General Data Protection Regulation (GDPR)	The General Data Protection Regulation (GDPR) is a legal framework that sets guidelines for the collection and processing of personal information from individuals who live in the European Union (EU). It also addresses the transfer of personal data outside the EU and EEA areas.
Global Vendor List (GVL)	The list of vendors who have registered with IAB for participating in the Framework. The list is currently managed and maintained by IAB Europe, and is referenced by CMPs, Publishers and individual vendors. Its structure and content shall be defined by the Specifications.
Personal Identifiable Information (PII)	Personal Identifiable Information is information about a specific individual including name, address, telephone number, and email address – when used to identify a particular individual.
Transparency and Consent Framework (TCF)	IAB's Transparency and Consent Framework (TCF) is the only GDPR consent solution built by the industry for the industry, creating a true industry-standard approach that looks to help all parties in the digital advertising chain compliant to both the EU's GDPR and ePrivacy Directive when processing personal data or accessing and/or storing information on a user's device. Transparency and Consent Framework: Framework comprising the various parts defined under standard Policies. It has the objective to help all parties in the digital advertising chain to comply with Privacy Law when collecting, using, or disclosing personal information.
Universal ID (UID)	A user identifier created by ad-tech to provide a shared identity to identify the user across the supply chain without syncing cookies.

Continued Reading

Moving Towards Cookie Independence – IAB Canada Guides

IAB Canada Guide to CMPs

Understanding Data:
- Book of Data Analytics
- Defining the Data Stack