THE CONSTANT SEARCH FOR BETTER SEARCH

March 2019
Search matters in travel. Why?

Because it’s often the first interaction a person has with a product or service. Imagine Celia wants to book a family trip to London. She goes to a hotel comparison site, types in her destination and several options appear. She chooses her preferred dates, budget and hotel. Done!

But imagine if all the hotel sites are down or are so slow to load that it takes Celia forever to find what she’s looking for. She’ll be frustrated and annoyed and may even give up on the idea. The point is that first interactions matter. Just like a bad opening conversation on a first date, search can make or break the customer relationship.

Take Google. It has become the most visited page on earth because it is the trusted gateway to the internet: an authoritative source of truth. We don’t even question the experience, it’s just built in to our every day because it works. We ask it what we want, and it gets us what we want, fast. And that’s why we return to it day in, day out.

According to research by PwC, 32% of customers will walk away from a brand they love after just one bad experience.

In today’s digital age, customer loyalty is hard to acquire but easy to lose. According to research by PwC, 32% of customers will walk away from a brand they love after just one bad experience. And with the competition being just one click away, it’s very easy to walk away.
KEEPING HUMANITY ON TRACK

But getting rail search right has a bigger purpose. It has many humanitarian benefits over other modes of transport.

Rail is efficient. It takes you to the heart of a city instead of leaving you stranded at an airport on the outskirts or stuck in a traffic jam.

Rail is productive. It allows people to work without distractions for a long period of time. Just ask JK Rowling, who came up with the idea for Harry Potter on a train from Manchester to King’s Cross in 1990!

Rail is cleaner. An independent study, commissioned by Eurostar, compared the CO₂ per passenger produced by a London–Paris train with that of a London–Paris flight and found that taking the train cuts CO₂ emissions per passenger by 90%.

Rail supports urbanisation. Train travel plays an important role in enabling the creation and expansion of cities by transporting millions of people per day, without needing new roads, car parks or airport terminals.

UP AGAINST IT

But despite these clear benefits, rail faces tough competition online.

Rail is complex. When compared with the one-click simplicity of finding and booking a flight on websites like Kayak and Skyscanner, booking rail travel can appear bewildering, with its different carriers, fare structures and journey options.

Rail has more legacy. Air search websites have pioneered the use of caching and mirroring techniques to make the experience lightning quick. In rail search, speed is made more difficult as the backend systems are not as advanced, leading to slower request times.

And lastly, consumers will only get more demanding. We all want more and expect more in today’s online world. Across all industries, we seek brilliant experiences and instant gratification. The likes of Amazon, Uber and Netflix are continually raising the bar of customer expectations.
FUTURE-PROOF IN FOUR

GIVEN THESE CHALLENGES, WHAT ARE THE THINGS THAT RAIL SEARCH NEEDS TO BECOME IN ORDER TO KEEP HUMANITY CHOOSING RAIL?

BE FAST

Speed is king. Despite its inherent complexity, rail search must be lightning fast in delivering back results, no matter how specific the users demands are in terms of arrival time, cost, least number of changes and so on. In our digital age of impatient and demanding consumers, every millisecond counts. The BBC’s own research found that they lost 10% of users for every additional second their site took to load.

THE BBC’S OWN RESEARCH FOUND THAT THEY LOST 10% OF USERS FOR EVERY ADDITIONAL SECOND THEIR SITE TOOK TO LOAD.

BE MULTI-CHANNEL

The channels through which rail is planned have changed dramatically. Back in the day, Celia, who lives in Bournemouth and wants to buy a cheap weekend ticket to visit her sister in Liverpool, would have phoned her local train company or gone to the station booking office. She would have to sift through pages of information or spend time waiting in a queue to speak to an adviser who would also have to sift through pages of information.

Today, Celia is most likely to do the research and booking herself on a mobile. Tomorrow, she may book on an intelligent assistant such as Amazon’s Alexa. (Note: SilverRail helped Virgin Trains become the first travel company in the world to sell tickets through Amazon Alexa.)

So the rail industry needs to offer accurate and up-to-the-minute information across multiple channels and be adaptable when change comes.

EMBRACE OPEN DATA

Transport information was once proprietary and access to it was carefully controlled. But a new era of open data access is sweeping through the industry, allowing information to be shared with new and existing players and allowing them to develop innovative new services that benefit rail customers. Citymapper, for instance, a much-loved transport app for cities, is powered by open data. The rail industry is working on many open data initiatives and SilverRail has already developed open data search products, such as Transport for Greater Manchester.

BE INNOVATIVE

The best digital businesses build customer loyalty and increase satisfaction by continuously innovating their product. Monzo, the UK bank, is enjoying meteoric growth. How? Amongst other things, by using data cleverly like packaging customer expenditure data so they can improve spending decisions. Railwebsites should visualise their data in clever ways to improve journey planning and help make rail the default choice. For example, to stimulate demand for lightly used off-peak services, SilverRail developed a weekend getaway app along with functionality that identifies cheap train destinations through colour-coded isochrone maps.

To conclude, rail search matters to humanity, and it therefore matters to us. Its bigger purpose and its constant challenge are why we constantly search for better search, and why we’re proud to invest millions of pounds every year to maintain our authority in reliable rail journey planning.
WHAT IS IPTIS?

IPTIS was started by mathematicians who developed sophisticated algorithms to handle the UK Rail industry’s complex mix of stations, operating companies, fares and rule sets, so enabling customers to identify the best travel option quickly.

Solutions based on the IPTIS platform are widely used in the United Kingdom and handle more than five million unique customer enquiries each day. By providing journey plans, timetables, fares, availability and real time information, IPTIS helps customers receive accurate and consistent journey information.

IPTIS has three fundamental design principles at its core:

ACCURACY
The advice given to rail travellers must above all be accurate – no one wants to be stranded on a platform late at night waiting for a connection that doesn’t exist. IPTIS calculates journeys dynamically in response to specific enquiries, using an in-memory model of the transport network without pre-calculating generic paths. This makes every journey plan the optimum for the specific set of search criteria, including the date and time of day.

TIMELINESS
No one likes to be kept waiting when trying to make their travel plans, whether it’s online or on the phone. SilverRail believes that a customer should never have to wait for a response from the journey planner and so IPTIS was designed so that all processing is performed without the need to interrogate a database, which would introduce delay.

RELIABILITY
IPTIS has been built on robust and resilient system architecture and the application suite is considered to be extremely reliable by all of SilverRail’s customers. This high level of reliability is a trademark of the IPTIS application.
RAIL YEARS AND COUNTING.

OVER 250 RAIL EXPERTS ACROSS BOSTON, BRISBANE, LONDON AND STOCKHOLM