

6.3.2 Example

A typical page for a player looks like the one in figure 6.2.¹³ Similar pages exist for hundreds of players, dozens of teams, all groups, all matches, etc., and of course all of these are highly interlinked.

The BBC has developed small ontologies to capture the domain of soccer, including domain-specific notions concerning soccer teams and tournaments, as well as very generic notions for events and geographic locations, using well-known ontologies such as FOAF¹⁴ and GeoNames.¹⁵

Figure 6.3 shows a small example of the BBC's World Cup ontology. These ontologies were used to infer additional information for display to the user, such as which national competition a player participates in and which team the player is a member of.

6.3.3 Adoption

The system powering the BBC World Cup site has a classical three-tier architecture, with (i) all information stored in an RDF triple-store, (ii) this triple store organized by a number of ontologies that enable querying of the triple store, and (iii) a user-interface layer that uses ontology-based queries to the triple store to obtain information to display to the user.

With this publishing model, the BBC claims to have greatly increased their opportunities for content reuse and repurposing, reduced the journalist headcount required to maintain the site, and improved the user experience through semantically driven page-layout and multi-dimensional entry-points (player, match, group, etc.).

At its peak, the system was powered by a commercial triple-store vendor that was handling a thousand SPARQL queries per minute (amounting to over a million queries a day), together with hundreds of RDF statements inserted or updated every minute, as

¹³http://news.bbc.co.uk/sport/football/world_cup_2010/groups_and_teams/team/england/wayne_rooney.

¹⁴<http://xmlns.com/foaf/spec/>.

¹⁵<http://www.geonames.org/>.