

Toulouse Stadium, Toulouse, France

Sports Stadium Saves 50% on Water and Fertilizer While Meeting Precise Turf Requirements with Rain Bird® Irrigation

Built in 1937, Toulouse Stadium is home to elite professional rugby and soccer teams. The venue has been meticulously maintained over the years to provide the very best experience for players, fans, and television broadcasts. Upgrades enable it to host international competitions, such as the 1998 FIFA World Cup and upcoming 2023 Rugby World Cup.

THE CHALLENGE

A focal point of the stadium is its high-tech turf, a hybrid of natural grass growing on a synthetic substrate. Strategic care is necessary to keep this unique AirFibr pitch green and healthy. The irrigation system must be smart and precise, able to endure abuse from professional matches without interfering with player safety. It must also manage water from two sources: the city and the nearby river.



ESP-LXIVM 2-Wire Controller with Smart Valve Technology

• 8005 Series Rotors

• IQ Central Control

Core Products Used:

- ESP-LXIVM 2-Wire Controller with Smart Valve Technology
- ESP-LXD Series 2-Wire Controller
- ESP-LXME Series Controllers

THE SOLUTION:

The Rain Bird® team will need to bring new and existing controllers together under one system for streamlined management of 4 fields, each with many zones. They must choose durable rotors that withstand punishing conditions on the field as well as any debris carried in the river water. Designing a system that connects to both water sources and efficiently manages the bypass will be key.

KEY OBJECTIVES

- ✓ Meet Precise Turf Requirements
- ✓ Withstand Harsh Conditions
- ✓ Manage Multiple Water Sources



Site Report: Toulouse Stadium, Toulouse, France

Rugby Stadium Saves 50% on Water and Fertilizer While Meeting Precise Turf Requirements with Rain Bird® Irrigation

APPROACH:

Increase Computing Power

The stadium's four pitches will be divided into 12 watering zones, each regulated by its own controller. To complement the existing ESP-LXD controller and two ESP-LXME controllers already in place, a new ESP-LXIVM 2-Wire Controller with Smart Valve Technology will be added. This top-of-the-line technology will deliver efficient irrigation, advanced diagnostics, and allow for convenient remote management.

Choose Abuse-Resistant Components

The project will use stainless steel 8005 Series Rotors with reinforced brass turrets engineered to withstand the abuse of hundreds of rugby and soccer games played on the pitches. 8005 Series Rotors are also available in non-potable models designed to hold up against any debris in the river water. Sprinklers will be carefully installed 1 centimeter below the soil's surface so players do not hit them and injure themselves.

Meet Exact Specifications with IQ Central Control

Temperatures in the stadium often exceed 45 degrees celsius. If the hybrid turf gets too little water, it will die in the heat. If it gets too much water—especially because some areas do not get any sun for 4 to 5 months out of the year—destructive parasites will proliferate and the grass will drown. Rain Bird's IQ Central Control system will ensure that the turf gets exactly the right amount of water. Features like Simple ET will evaluate ET values daily and automatically adjust individual stations according to weather. The system will manage the bypass of dual water sources with ease and it will allow for convenient remote management from any authorized device.



ESP-LXIVM 2-Wire Controller with Smart Valve Technology

RESULTS:

Scoring a Big Win

Whether viewed in person or on television, the turf at Toulouse Stadium looks bright green and beautiful. As an added benefit of the new Rain Bird installation and daily control, the stadium has reduced their fertilizer consumption and water bill by 50% each.

