

## Personal Details

Eamonn Duffy

Notice Period: 6 Weeks.

## Areas Of Expertise

Effective communication with superiors and colleagues; Full lifecycle experience, from large to small projects; Team environments; Object Oriented Design and Development; MS Windows; Visual Studio; .Net and .Net Core; C#; ADO.NET; Entity Framework; ASP.NET MVC & Web API; SQL Server; Windows Services; RESTful Web Services; SOAP; Visual C++; Multi-threading; COM; MFC. Novice/Intermediate: Mentoring; Code Reviewing; CI/CD – TeamCity/Octopus-Deploy; Jira; Angular 6; Visual Studio Code; JavaScript; TypeScript; Git; ASP.NET Core; Xamarin; Java; PHP; XML; HTML/CSS; NetBeans.

## Qualifications

[Dublin City University \(DCU, née NIHE\)](#) B.Eng. (Honours) in Electronic Engineering.

## CAREER TO DATE

### [Payzone \(Ireland\)](#)

**December 2011 – Present**

- Payzone provide Financial-Technology/Payment Solutions.
- Work was carried out using Visual Studio 2008 to 2019, and Visual Studio Code.
- Work was initially carried out in **Windows Services, C#, SOAP, SQL Server** and **SSRS**.
- Work was also carried out in **C#, HTML/CSS, JavaScript, jQuery** and **ASP.NET MVC**.
- Work was additionally carried out in **C#, SQL Server, Angular 6, Visual Studio Code, ASP.NET MVC & Web API (RESTful Web Services)**.
- Work has more recently been carried out in .Net Core and organised using **Jira**, reviewed using **Git**, and integrated and deployed using **TeamCity** and **Octopus Deploy**.

### [EVE/GHIS/GHIS Student Portfolio](#)

**June 2010 – November 2011**

- Web Design (**HTML, CSS, JavaScript, jQuery**); some image processing; using Adobe CS3.
- ECDL Syllabus 5 (**Microsoft Office**).
- Communications.

### **Personal Learning & Development**

**May 2009 – June 2010**

Pursuing Windows and Cross-Platform software-based learning for interest and to improve skills.

- Web Services (**C#, ASP.NET, Java, XML, Password Hashing**).
- Web Site updates and investigation (**C#, ASP.NET, XML, PHP, HTML, Java**).
- Visual Studio .NET 2003; Visual Studio Express Editions: 2008 & 2010; and NetBeans.

### Client: [Sony Broadcast & Professional \(Europe\)](#)

**January 2008 – April 2009**

- Sony develop products and provide services for the broadcast and medical industry.
- Work was carried out using Visual Studio 6, Visual Studio .NET 2003 and Visual Studio 2005.
- Initially worked in **C++**, **MFC** and **STL**, with sockets and some simple threading, and then worked in **C#** and **C++**, with some threading.

### Client: [CheckFree](#) via 6PM Consultancy

**June 2007 – July 2007**

- CheckFree produce Banking and Cheque Processing solutions.
- Work was carried out using Visual Studio .NET 2003; ultimate target system was Solaris.
- Worked in **C++** (with some **STL**) from design work done by a Technical Architect using UML.
- Produced unit tests as the code was developed; all code was reviewed before it was checked in.

### Client: [Axxia](#)

**January 2007 – May 2007**

- Axxia produce case and document management software for the legal profession.
- Work was carried out using Visual Studio 2005.
- Worked in **C++**, **MFC** and **SQL**, with some **ATL** and **COM**, and some simple threading.

**Client: MMI Research****July 2005 – January 2007**

- MMI Research specialise in communications and security solutions.
- Work was carried out using Visual Studio .NET 2003 and Visual Studio 2005.
- Initially worked in C++ and MFC, and then worked in C#, Managed C++ and C++ (with some STL and multi-threading).

**Client: Oxford Instruments Medical****January 2004 – December 2004**

Originally called Medelec (see later).

- Oxford Instruments Medical produced medical electronic solutions.
- Work was carried out using Visual Studio .NET 2003.
- Design work was carried out using UML, and implementation was carried out using C++ and MFC, with some multi-threading.

**Eadent****February 2003 – June 2010 And April 2021 – Present**

Pursuing Software-Based Business Startup Ideas, including with colleagues, and additionally with some Contracting/Consultancy.

- Developing a Media Archive (and Access) Service (<https://www.Rapture.global/>) and a Self-Help Therapy Resources Service (<https://Therapy.Rapture.global/>) (C#, HTML, CSS, Azure).
- Developed a location-based tracker (using GPS) with map display (C++, MFC, Map Pro, SMS Gateway).
- Developed a multi-tier knowledge management system, using a unit test driven approach, with a location-based prototype web site application (C#, ADO.NET, SQL Server, csUnit).

**Travelling and visiting family and friends****June 2002 – January 2003**

Florida, New York, Singapore, Australia, New Zealand and Hong Kong.

**Muse Gaming/GoldPlay UK/Kismet Studios****April 2000 – April 2002**

Developing a gaming system accessible over the Internet.

- The gaming system consisted of: ATL client-server framework; SQL Server; IIS; chat server; web-based administration. Each game had client and server components running on this framework.
- Team-based environment.
- Defined the system architecture for the addition of chat and auto-update functionality.
- Developed the multi-threaded chat server (TCP/IP sockets, I/O completion ports, C++, ATL).
- Developed the client side of the auto-update facility (TCP/IP sockets, C++, ATL).
- Worked with team involved in defining the architecture for adding multi-player functionality.

**Sony Broadcast & Professional (Europe)****August 1997 – March 2000**

Developing products and providing services for the broadcast industry.

Systems Product Development was a Consultancy department within Systems Integration division, developing project-based custom software solutions, for local and international clients. Example projects:

***Big Brother (Dutch [1999] & German [2000])***

- Developed software for part of the initial Big Brother TV shows.
- Wrote a multi-threaded in-process COM server (C++, ATL, OLE DB) to interact with an Oracle database.
- Successfully established good channels of communication with colleagues in Holland, who were responsible for developing the applications that used the server.
- Commissioned systems on site with Dutch colleagues, for the first Dutch and German shows.

***Subtitle And Stream Synchroniser; Material Broker***

- Initially developed part of a large system for a customer in Israel (Subtitle And Stream Synchroniser application).
- The multi-threaded, **C++** and **MFC** application (with UI) interacted with 5 other systems (using **TCP/IP sockets**) and an Oracle Database. Two of the systems were provided by external companies.
- Developed simulators for the external interfaces as the systems were not available locally.
- Later assisted a colleague develop another part of the system (Material Broker application).
- Developed an in-process **COM** server (**C++**, **ATL**, **OLE DB**) to interact with an Oracle database, and integrated it into the application.
- Co-developed the code to parse and generate simple **XML** files (**C++**, **MFC**, **Microsoft XML interfaces**).

#### *Tape Library System*

- Part of a 4 strong team developing a Tape Library System for a Spanish customer.
- Co-designed the system using **UML** and **Rational Rose**.
- Developed an in-process **COM** server (**C++**, **ADO**) to interact with an Oracle database. This was used by the other applications in the system.
- Developed the Librarian Client UI application (**C++**, **MFC**).
- Developed an Event Logging in-process **COM** server (**C++**, **ATL**), which was later re-used on other projects.

#### *Tape Preparation System*

- Part of a 6 strong team (2 Sony, 4 external) developing a Tape Transfer system for an Italian customer.
- Responsible for developing the Tape Preparation part of the system.
- Interacted extensively with Italian engineer responsible for the PLC control of the conveyor belts and robots, and co-developed a software/control architecture with them.
- Developed many multi-threaded in-process **COM** servers (**C++**, **MFC**, **Serial communications**) for controlling Bar Code Readers, a Bar Code Printer and a Tape Cleaning Unit.
- Developed a main application, with UI, (**C++**, **MFC**) to sequence and control the overall Tape Preparation process, including communication/interaction with the PLCs via Digital I/O lines.

#### Medelec

**September 1988 – July 1997**

This company designed & manufactured medical diagnostic equipment.

- **Synergy** – Real-time, multi-threaded, MS Windows-based signal acquisition and analysis equipment.
  - Member of architecture team. Used a combination of **OMT** and **Booch**, and the System Architect tool.
  - Member of team that designed and implemented the multi-threaded real-time trace display (**C++**, **MFC**).
  - Initially developed the multi-threaded framework (**C++**, **MFC**) for the system.
- **Athena NT+** - Real-time, multi-tasking, PC-based, vital signs monitoring equipment.
  - Developed from scratch for sister company in Denmark, using **iRMX** for Windows Operating System.
  - Designed and developed parts of the main multi-tasking PC software (**ANSI C**, **iRMX for Windows**) and all of the real-time display software for the custom graphics card (**ANSI C**, **Texas Instruments 34010 Assembly Language**).
  - Seconded to Denmark for 16 months to assist the transfer, completion and launch of the product.
- **Sapphire**: Developed text-display, interrupt handler and startup software (**ANSI C**, **Hitachi H16 Assembly Language**).