# Ken Keenan — Curriculum Vitæ

## Summary

I am a contract full stack senior programmer/ developer with over 25 years' experience across the IT industry in Ireland, most recently in .NET technologies, with good writing and communication skills.

## Contact Details

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| **Stack Overflow** | http://kaia.ie/q/so |
| **GitHub** | http://kaia.ie/q/gh |
| **Availability** | March 2023 |

## Education

- BE, Electronic Engineering, University College Dublin, 1995
- MSc, Software Engineering and Database Technologies, NUI Galway, 2011

## Top Skills

- .NET Core
- ASP.NET MVC
- SQL Server
- Oracle PL/SQL
- WCF
- C#
- Visual Basic.NET
- T-SQL
- Java
- JavaScript/ jQuery
- HTML5/ CSS
- C/ C++

## Recent Job History

| | |
|---|---|
| **Duration** | January 2022 – December 2022 |
| **Type** | Contract |
| **Client** | Leaders Enterprises Group |
| **Title** | Senior Developer |
| **Skills** | C#, SQL Server, WinForms, VB6 |

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|---|---|
| **Duration** | June 2016 – July 2018 |
| **Type** | Contract |
| **Client** | SGS Ireland |
| **Title** | Senior .NET Developer |
| **Skills** | C#, ASP.NET MVC, Web API, Oracle PL/SQL, JavaScript (jQuery, Kendo UI, Knockout.js Require.js), TFS |

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|---|---|
| **Duration** | July 2019 – December 2021 |
| **Type** | Contract |
| **Client** | An Post |
| **Title** | .NET Developer |
| **Skills** | ASP.NET Core, Web API, Oracle PL/SQL, git (BitBucket) |

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|---|---|
| **Duration** | January 2015 – July 2015 |
| **Type** | Contract |
| **Client** | eShopWorld |
| **Title** | Senior .NET Developer |
| **Skills** | C#, Microsoft SQL Server, WCF, WebAPI, git |

| **Duration** | October 2013 – October 2014 | **Duration** | April 2013 – September 2013 |
|---|---|---|---|
| **Type** | Contract | **Type** | Contract |
| **Client** | Wonga Technologies Ltd. | **Client** | Version 1 |
| **Title** | .NET Developer | **Title** | .NET Developer |
| **Skills** | C#, Microsoft SQL Server, Service Broker, WCF, TeamCity | **Skills** | C#, ASP.NET MVC, Windows Azure, SSIS, Dynamics CRM |

# Detailed Job History

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|---|---|
| **Job title** | Senior Developer |
| **Employer** | Leaders Enterprises, Ltd. (Retail/ Point-of-Sale) |
| **Duration** | January 2022 – present (6 months) |
| **Description** | A 12-month contract with a previous client, working in the retail/ point-of-sale sector. This contract was carried out part time, 4 days per week. The main goal of this contract was as a stopgap resource, providing application support while new developers were brought on board. This involved resolving issues raised by customers. I also developed an integration between Leaders' point-of-sale product and a customer's ERP system. |

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|---|---|
| **Job title** | .NET Developer |
| **Employer** | An Post (Group Technology Solutions Retail) |
| **Duration** | July 2019 – December 2021 (2 years, 5 months) |
| **Description** | This contract was initially on a 3-month basis, and subsequently extended. This contract was carried out part time, initially at 3 and later at 4 days per week. The main goal of this contract was the delivery of an API to support the creation of a new Web site for customers of the Irish State Savings programme to view their holdings online. The first release of the site was made live early in 2021. The project was developed in ASP.NET Core Web API using Swashbuckle to generate OpenAPI contracts for the developed interface. |

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|---|---|
| **Job title** | Senior .NET Developer |
| **Employer** | SGS Ireland (Auditing and inspection services) |
| **Duration** | Jun 2016 – July 2018 (2 years, 1 month) |
| **Description** | This contract was initially on a 3-month, part-time basis to enable my return to work after the period of illness described below; after the probationary period, it was extended to a rolling contract. During this time, I worked on a number of projects for SGS, both legacy and greenfield applications, and for both internal and external customers of SGS Ireland. The core stack was ASP.NET MVC using C#, with Oracle as the back-end database. I worked on the following projects: |

- The administrative back-end Web site for a car insurance quotation application. The application pages were implemented using ASP.NET MVC, C# and jQuery, with a Dapper data-access layer and Oracle database back-end. Pages were built to allow quotations to be approved and rejected, as well as an interactive dashboard showing approval/ rejection rates broken down by date, make of car, geographic region, etc.

- Enhancement work on an existing Web site for a third-party customer to manage a green certification programme. The application was written using ASP.NET MVC and C#, using Kendo UI widgets for the front-end along with some Knockout.js for the more complex pages, and a data-access layer using Entity Framework 5 (Code First, upgraded to version 6). This job required the implementation of new pages and correction of bugs and shortcomings in the existing data model. As part of this work, I

used Require.js to modularise several thousand lines of JavaScript code to assist future support efforts.

- Work on greenfield applications for SGS Oil, Gas and Chemicals division. This work comprised a number of related applications for contact management, fuel specifications and retail inspections. The applications were built using ASP.NET MVC and C# as before with Kendo UI widgets on the front end, and Dapper as the data access layer.

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| **Job title** | Senior .NET Developer |
| **Employer** | eShopWorld (eCommerce) |
| **Duration** | Jan 2015 – July 2015 (7 months) |
| **Description** | This was a contract intended to run for 12 months but I was forced to give early notice after developing chronic persistent headaches. The contract was with eShopWorld, an Irish eCommerce company who provide international shipping and fulfilment services for the online stores of a number of large retailers such as Victoria's Secret and Urban Outfitters. |

The role involved creating new APIs using WCF and Web API for consumption by retailers and eShopWorld's own front-end team, and adding new and enhancing existing back-end business logic for new retailers. In addition to these responsibilities, I built a test framework using Moq to help improve test coverage.

A key achievement in this role was to act as a subject-matter expert on the git version control system for the eShopWorld team.

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| **Job title** | Contract .NET Developer |
| **Employer** | Wonga Technologies Ltd. (Financial Services/ Lending) |
| **Duration** | October 2013 – October 2014 (1 year) |
| **Description** | This was an initial 3-month contract (subsequently extended) with Wonga, a UK loan provider. The contract involved working with Wonga's Decision Science/ Risk development team, supporting a legacy risk decision system while customers were migrated from it. During this contract, I prepared bug fixes and enhancements for the risk system which comprised a number of WCF and Windows services with a SQL Server back-end, and participated in releases. |

Key highlights of the role included re-implementing a bulk upload of credit data using Microsoft SQL Server Service Broker, reducing the run time from over 20 hours to under 3 hours, and helping to automate the release process using TeamCity build configurations.

| **Job title** | Contract .NET Developer |
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| **Employer** | Version 1 (IT Consultancy) |
| **Duration** | April 2013 – September 2013 (6 months) |
| **Description** | This was initial 3-month contract (subsequently extended) with Version 1, an Irish IT consultancy with whom I had worked previously in 2006/ 2007. |

On this contract, I worked on a number of projects for Version 1 and their clients including:

- Some ASP.NET MVC work on the CoVIS (Commercial Vehicle Information System) project being developed for the Road Safety Authority.

- A re-development of an internal student class list application for the Dublin Institute of Technology, rewriting a legacy Java servlet application in ASP.NET MVC and Nhibernate.

- Contributing to the development of an internal proof-of-concept application on Microsoft's Azure cloud platform.

- The development of a data flow using SSIS and WCF Web services between legacy systems and a Microsoft Dynamics CRM Online instance for Version 1 customer in the healthcare sector.

| **Job title** | Contract .NET Developer |
| --- | --- |
| **Employer** | SGS (Automotive, auditing services) |
| **Duration** | July 2012 – November 2012 (5 months) |
| **Description** | A 5-month contract with SGS, a multinational company specialising in audit services for a number of industry sectors. |

During the contract, I worked on autoCARS, a new line-of-business application for SGS designed to facilitate auditing of dealer warranty claims for car manufacturers. The application was written in VB.NET using version 4 of the .NET Framework with an ASP.NET (Webforms) front end using Telerik RadControls and custom jQuery, and an Oracle 11g back end.

The tasks I carried out on the contract included the production of technical specification documentation; the development of the ASP.NET front end, middle-tier logic and database stored procedures in PL/SQL; and bug-fixing during the test and user acceptance phases of the project.

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| **Job title** | Contract .NET Developer |
| **Employer** | BearingPoint (IT Consultancy) |
| **Duration** | September 2011 – June 2012 (9 months) |
| **Description** | This was a contract with BearingPoint, an international IT consultancy firm. Prior to taking this contract, I took a few month's career break to complete my thesis for my Master's degree. |

On this contract, I worked on a greenfield development project for Spencer Stuart, a worldwide executive recruitment firm. The project was a rewrite of a legacy desktop-based system used by Spencer Stuart personnel for executive searches using a more up-to-date technology stack: C# 4.0, ASP.NET MVC 4, and jQuery were used on the front end, a service layer based on WCF was used for the middle tier and NHibernate and SQL Server 2008 were used for the persistence layer. The development followed test-driven development (TDD)/ continuous integration (CI) principles with an NUnit test suite using Rhino Mocks and Selenium for automated UI testing. The CI system used was TeamCity and version control was using Subversion.

My role involved designing and implementing new functionality in the application based on use case documents and wireframes, including unit and integration tests, and fixing bugs.

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| **Job title** | Contract .NET/ SQL Developer |
| **Employer** | Siemens IT Solutions & Services (Ireland) Limited (IT Consultancy) |
| **Duration** | September 2010 – April 2011 (6 months) |
| **Description** | This was an initial 3-month contract, extended to 6 months, working on support for and enhancements to systems maintained by Siemens IT Solutions & Services (now ATOS) on behalf a number of public-sector and semi-state clients including the Irish Naturalisation & Immigration Service (INIS), An Garda Síochána and Irish Cement. |

The systems being supported were written in a variety of Microsoft technologies: SQL Server (2005 and 2008), .NET (versions 2.0 and 4.0), BizTalk 2006, and Access. My responsibilities included producing specifications for enhancements and bug fixes based on change requests and trouble tickets received from clients, and the development and testing of these enhancements and fixes. In addition, I carried out some investigative work to address capacity and performance issues in a number of these systems.

| **Job title** | Senior Developer, Escalations |
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| **Employer** | Leaders Enterprises, Ltd. (Retail/ Point-of-Sale) |
| **Duration** | August 2009 – May 2010 (9 months) |
| **Description** | Leaders Enterprises is a leading supplier of Point-of-Sale systems for retail outlets in Ireland; for example, the Spar chain of convenience stores. |

The role of escalations developer involved analysing incident reports received by the Leaders Help Desk by customers to determine if a fix was necessary, documenting and producing the fix, and liaising with the QA team to test and deploy the fix to the customer's site.

The Leaders software was written in T-SQL and C# with some legacy components written in VB6. The version-control system in use was Subversion.

| **Job title** | SQL analyst (contract) |
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| **Employer** | Accenture/ Microsoft (IT Consultancy) |
| **Duration** | October 2007 – July 2009 (1 year, 9 months) |
| **Description** | This was a 12-month contract (subsequently extended) with Accenture, an international IT consultancy, working in Microsoft's License and Program Operations Centre on the MSLicense application suite. This family of line-of-business applications had hundreds of users worldwide both in Microsoft's own Regional Operating Centres and its channel partners and played a vital role in managing Microsoft's licensing revenues. Enhancements to the system were carried out on a quarterly release cycle using a standard SDLC methodology with version control, bug tracking and unit testing using Visual Studio Team System 2008. |

My work on this application involved implementing new and enhanced functionality for Microsoft's Select Plus and Open Value and Subscription licensing programmes, and implementing enhancements to the Online Services licensing. This involved the production of functional and technical specification documentation and the development and testing of new and enhanced functionality in T-SQL (SQL Server 2005), C# and Visual Basic. During my time on the project, our team successfully delivered a number of quarterly enhancement releases.

| **Job title** | Contract .NET/ Oracle developer |
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| **Employer** | Version 1 Ltd. (IT Consultancy) |
| **Duration** | May 2006 – May 2007 (1 year) |
| **Description** | This was 12-month contract with Version 1, a Dublin-based software consultancy, and involved working on a number of .NET and Oracle projects. |

The larger project involved a series of major enhancements to a customer management system for a large UK waste-management company. The application was written in Visual Basic .NET (framework 2.0) with a Microsoft SQL Server back-end (initially version 2000 but migrated to 2005 during the project) with about 70 users accessing the application via Citrix. The enhancement work, which required changes to both the front-end and the back-end, included new Windows Forms and Transact-SQL stored procedures, as well as new reports

using Crystal Reports. I developed and tested the enhancements and supervised their rollout, and made a site visit to the UK to gather requirements for the customer for future developments.

I also designed and implemented a simple Web service interface between a Web application being developed for a Version 1 client and the client's accounting package (Sage MMS). This interface consisted of a number of PL/SQL packages and supporting Oracle tables on the database server and a number of ASP.NET pages on the application server to validate the XML and pass the data to Sage. The interface allowed order information to be seen in Sage in near-real time.

In addition, I provided XML consulting expertise on a number of smaller projects.

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| **Job title** | Contract C++ developer |
| **Employer** | Institute of Microelectronics and Wireless Systems, NUI Maynooth (Education) |
| **Duration** | January 2006 – April 2006 (3 months) |
| **Description** | This contract comprised a 3-month study carried out by the Institute of Microelectronics and Wireless Systems at NUI Maynooth into the feasibility of an IC mask layout product based on the OpenAccess C++ API supported by most Electronic Design Automation vendors. I delivered a proof-of-concept application, written in C++ on Linux (Fedora distribution) using the wxWidgets GUI toolkit and OpenAccess reference implementation. In addition to the proof-of-concept, I produced a report describing the process and my assessment of the maturity of the OpenAccess support in the major vendors' EDA tools. |

The project was carried out in partnership with a local semiconductor design business and funded by Enterprise Ireland.

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| **Job title** | Contract developer |
| **Employer** | XML Workshop Ltd. (IT consultancy) |
| **Duration** | May 2005 – December 2005 (7 months) |
| **Description** | Having taken time off after working with the ESB, I began work as an independent contractor, trading as Kaia. My initial contract was with XML Workshop Ltd., a small software company based in Harold's Cross, Dublin, I worked on a number of projects, mainly on VBA projects and Web applications written in PHP and MySQL: |

- I developed enhancements for YAWCOnline, XML Workshop's Word-based Web content publishing software, implemented in VBA and PHP.

- I developed enhancements for SmartCAS, a Web-based (PHP and MySQL) Customer Acquisition System designed by XML Workshop for Smart Telecom's (a now-defunct telecom company) call centre.

- I worked on the migration of the SmartCAS system from MySQL to Microsoft SQL Server, creating DTS scripts and Transact-SQL stored procedures;

- I also worked on a number of smaller projects in a variety of languages including ActiveState Perl and Macromedia Lingo. I also carried out accessibility testing on a

number of client Web sites.

- ■ I set up and configured a number of Debian Linux servers for development and production use.

- ■ Although this contract is "ancient history" at this point, I cover it in some detail here as it is good showcase of my abilities, involving as it did an eclectic mix of skills and the ability to respond quickly to changing customer requirements.

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| **Job title** | Various |
| **Employer** | ESB |
| **Duration** | April 1998 – December 2004 (6 years, 8 months) |
| **Description** | From April 1998 to December 2004, I worked for the Electricity Supply Board, initially for ESB International Computing and subsequently for ESB IT Solutions directly when the two organisations were merged. As I was employed by ESB Group companies in one form or another for nearly seven years, I worked on a number of different projects and changed roles a few times. |

Technologies used: Java, Oracle, VB6, OpenVMS, Microsoft Access

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| **Job title** | Various |
| **Employer** | Corel Corporation Ltd. |
| **Duration** | July 1995 – February 1998 (2 years, 7 months) |
| **Description** | After graduating in 1995, I worked for Corel Corporation Ltd., the Irish subsidiary of Corel Corporation, an international company headquartered in Canada and specialising in graphical software. During my time with Corel, I held a number of different titles. |

Technologies used: WinHelp, WordBasic, VB4, Microsoft Access

# Education

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| **Qualification** | Bachelor of Electronic Engineering (BE) (full time) |
| **Awarded By** | University College, Dublin |
| **Duration** | 1990- 1995 |
| **Result** | Pass |
| **Final Year Project** | "Fast Implementation of Arithmetic using the Logic Cell Array" |

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| **Qualification** | MSc, Software Engineering and Database Technologies (part time) |
| **Awarded By** | NUI Galway, Regis University |
| **From** | 2009 - 2011 |
| **Result** | 1st Hons |
| **Thesis** | "SourceYarn: Visualising Version Control Artefacts for Improved Code Comprehension" |

## Certifications

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| **Qualification** | DevOps Foundation Certification |
| **Awarded By** | DevOps Institute |
| **Duration** | January 2017 (2 day course) |
| **Result** | Pass |

# Skills

| Skill | Experience |
|---|---|
| **Project skills** | |
| Design specification | Expert |
| Project management | Basic |
| Requirements gathering | Expert |
| Technical writing | Intermediate |
| **Database technologies** | |
| Access | Expert |
| MySQL | Expert |
| Oracle | Expert |
| SQL Server | Expert |
| **Web technologies** | |
| ASP.NET | Expert |
| ASP.NET MVC | Expert |
| HTML | Expert |
| PHP | Expert |
| XSLT | Basic |

| Skill | Experience |
|---|---|
| WCF | Intermediate |

**Programming languages**

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|---|---|
| C | Expert |
| C++ | Basic |
| C# | Expert |
| Pascal | Basic |
| Java | Expert |
| JavaScript/ jQuery | Expert |
| VBA | Expert |
| Visual Basic 6 | Expert |
| Visual Basic.NET | Expert |
| Python | Basic |
| Windows Batch | Expert |
| Unix shell | Intermediate |

**Testing/ mocking frameworks**

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|---|---|
| Microsoft Test | Intermediate |
| NUnit | Intermediate |
| Moq | Basic |
| Rhino Mocks | Intermediate |
| FakeItEasy | Basic |

**Operating systems**

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|---|---|
| Linux | Expert |
| OpenVMS | Intermediate |
| Microsoft Windows | Expert |

**Version control and bug-tracking software**

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| Bugzilla | Intermediate |
| CVS | Intermediate |
| PVCS | Intermediate |
| Visual Studio Team System | Intermediate |
| JIRA | Intermediate |
| Subversion | Expert |
| git | Expert |

## Other interests

- Art & architecture

- Cooking

- Cycling (member of Dublin Cycling Campaign)

- Public Speaking (former member of ESB Toastmasters)

- Reading

- Walking