**Mark Tennenhouse**

* Over 22+ years object-oriented backend coding C#, Node, SQL, ASP.NET and .Net Core.
* Solid experience developing Cloud API/Microservices, REST API and Front End (Angular/ Vue React/). Skilled in Azure PAAS including Service Bus, Event Grid, Logic Apps.
* Senior level skills in SQL, LINQ, Stored Procedures, Views and with several ORM’s including Entity Framework and Dapper.
* Seasoned professional software developer with expertise in Enterprise Integration and application development for both large scale Enterprise applications and smaller corporate applications

**TECHNICAL SKILLS:**  
**Languages:** C#, TypeScript, Asp.NET, VB.NET,Vue, React 2(v 15-16), Angular1-7, JavaScript, SQL, Node, C, Knockout.js, jQuery, Bootstrap, CSS, HTML5, Unity3D.

**Source Control**: DevOps, GitHub, TFS, Tortoise SVN, Mercurial  
**Development Tools:** .NET Platform: VSCode, Visual Studio 2000-2019, Unity3D, MonoDevelop, VSCode, Koreographer(unity audio design), Unreal Engine.  
**Testing:** Server side testing with MOQ**,** MSTest and Nunity**,** Angular Unit testingwithJasmine, Karma..

**Architecture**- Agile Scrum training, UML Class Activity, Modeling, Use Case Diagramming, Clean Architecture for .NET Core,

**Servers:** IIS 6-10, Windows Server 2003- 2019

**Platforms:** Azure Enterprise Service Bus, Blob Services, Data Factory, Logic Apps, Event Grid, CosmosDB

**External Projects**: Unity3D/UnrealEngine Game Developer: Building a multi-platform rhythm game for teaching how to play the piano using animated characters, downloadable songs, Midi, PianoVR™ teaching system, with multiple styles including Jazz, Rock, Classical, and Blues.

**Hackathons:**

**AT&T Mobile Hackathon: Carl DeSantis Building** Nova Southeastern University

April 17-18. Created a Unity based first person shooter game.

Bitcoin Hackathon: Created an anonymous payment system for mobile devices.

**Speaker at: Feb 2020 Code Camp** -Nova Southeastern Univ

**Topic: How to build apps using Azure Data Factory, Logic Apps, Service Bus, Blob Storage**

**Speaker at: Feb 2016** Code Camp -Nova Southeastern Univ.

**Topic: The art of Debugging anything.**

**Work Experience:**

**Ryder.com: Senior Cloud API/Microservices Developer October 2019-Present**

* Cloud API Microservices Developer working on a large team of sixty developers, redesigning all the company's main applications for handling accounting, time tracking, HR and client communication.
* Most of the applications I have built follow a common pattern starting with a message in Azure Service Bus, which triggers a Logic App that starts a Data Factory Pipeline task to process the data. All applications use .NET Core 2.1. We briefly tried to migrate to 3.0 and had to revert to 2.1.
* Starting from discussions with the business, create a business and technical design document and then code, test and deploy the application on Azure.
* All applications are built using **PAAS**, Azure Cloud Services including Service Bus, Logic Apps, Data Factory, Azure Blob and Azure Event Grid. All code is designed and deployed in the cloud, not on our local machines. Everything is scripted and deployed without dependence on local source-code.
* Interact every day with multiple departments and managers at various levels within the organization. We use GitHub on DevOps with a CI/CD pipeline for source control and Deployment
* Responsible for end to end development and testing. All of the Enterprise Integration involve multiple steps and a wide range of technologies including Informatica Business Process development, DB2 databases, Mainframe Data (AS400) communication and a variety of other systems. Front end using Angular 7 and testing services using Postman.

**Fox/Disney Studios: Tech Lead API/Application Developer Feb 2019-Oct 2019**

* Worked on the Fox/Disney Screeners Application(Disney+ service) with a massive client base of over 100,000+ users in multiple countries on multiple devices including web, IOS, Android and TVOS. Daily use of multiple **DevOps** services including builds & deployment to multiple servers,
* Worked on all aspects of a large Enterprise scale .NET Core 2.1 (Disney+) application using a Single Page model architecture with AngularJS and Angular 7 for front end logic.
* Used C# to develop and modify WebAPI logic in a multi-tier service/object-oriented architecture with a single sign on architecture to handle multiple authentication providers (OKTA)
* Assisted in rewriting the security and membership logic for integration with Disney’s Authorization API. All of the meta data for each movie and television show is controlled by this application.
* Backend is all SQL Server stored procedures and Redis (for caching data). All database modifications are handled using Entity Framework/Codefirst deployment using scripts
* Wrote Azure PowerShell scripts to automate programming/reporting tasks and wrote all the scripts to backup/transfer and execute SSRS Reports. Worked on a series of **Webjobs** to execute reports.
* For build/test/deployment and pull requests, we use the continuous integration (CI/CD) DevOPS pipeline service on Azure and we deploy every day to QA and test environments. All code is reviewed using Github’s pull request process and the CI/CD pipeline prior to acceptance and merging to allow for comments and improvements

**OfficeDepot.com: Technical Lead/Senior API Developer Mar 2018- Jan 2019**

**Delray Beach, Florida**

* Technical lead on the API functionality. I meet daily with at least three business analysts and the heads of several departments as part of a team responsible for creating a new application to manage hundreds of vendor contracts on thousands of products sold at Office Depot
* Divide the Front-End tasks between our Angular developer and myself
* Convert the specifications into WEBAPI functions and Angular 7.0 components
* Was the lead on several core sections of the .Net CORE WEBAPI application including the search and filtering Front end and API which worked over several hierarchies of classifications, the front and back end for the Hierarchy Management which dynamically re-assigns contracts according to rules, and Payment Installments Front and Back End API for extending and authorizing payment durations.
* All of the components are written in C# on Web API .NET Core 2.1 and Angular 7.0. All code was tested and passed by a team of QA testers and is ready for Deployment.

**Arkitechs.com: Technical Lead/Application Architect May 2016- Mar 2018**

**Fort Lauderdale, Florida**

* Lead Application Architect/Senior Developer responsible for the company’s primary application.
* Built three main Case Management applications which are now in use by several Caribbean Countries including Trinidad/Tobago and Barbados
* Prototyped, coded and deployed most of the major sections using MVC, and WebAPI in C# on Azure in .NET Core 2.1. Coded all Angular prototypes and examples for entire team to use.
* Lead Developer for the entire team of 10. Overcame several interesting challenges including research and coding for creation, installation and testing of Digital Certificate signing for PDF documents on Azure, Document Storage and retrieval using Azure Blob Service.
* Setup, coded and deployed Microservice applications on Azure for converting 1000-page Word documents to PDF. Using **AWS**, created **Docker** applications to compare with Azure.
* Setup the CI/CD pipeline from scratch and am responsible for Dev, QA and Production deployment, digital certificate creation and deployment.
* Run our daily SCRUM meetings, write specifications and run daily code reviews, give out task assignments and report on timeline estimates for a team of 10 developers.
* Coded multiple pages and components in Vue.js on several projects with second team.

**G4S Secure Solutions: Senior Developer March 2015-May 2016**

* Tasked with redesigning sections of the database to allow for reporting on XML fields and for handling large tables (over 50 million records)
* Wrote and implemented a SQL based solution to parse and migrate the XML into a set of relational summary tables. Query time dropped from two minutes down to five seconds.

Skills: C#, Advanced SQL skills including Partitioned Views, Pivot Tables, XML functions, Complex logic, Database Jobs, Table Partitioning, Report Generation tools including Izenda, Devex.

**McKesson.com: Senior Application API Developer March 2014 – March 2015**

**West Palm Beach, FL**

* Designed, coded and deployed sections of a healthcare application to allow users to drag and drop entire sections and templated form elements, eliminating the need to manually create html documents
* Designed, coded, tested and deployed a Print Preview function in ReactJS to display a printed version including patient information from a newly created form.
* Researched and coded a unique way of providing an Undo/Redo function to allow users to go back in history and return to how the form looked previously. This allowed an unlimited number of "go backs" making form creation easy and more intuitive.
* This feature made the application function almost exactly like a windows application, which is not easy to emulate in a web application.

Skills: C# 4.5, Object Oriented jQuery/React, ASP.NET, MVC, Medical, Web, Database Design, SQL Query Optimization, Object Oriented Design, Entity Framework 4.5, Application Security Design, jQuery and JavaScript Frameworks, LINQ to SQL / Objects, SQL Server 2012

**InaClickMedical.com- System Architect/Developer July 2012 – March 2014**

**Fort Lauderdale, FL**

* Was the lead Architect responsible for coding of the front end (Angular.js), middle tier (MVC in C#) and back end (Entity Framework)
* Led a team of developers and graphic artists in the design of an Online Medical Appointment system for various medical providers
* Redesigned the system using Bootstrap to be compatible with Mobile devices
* Coded a Systray application using SignalR to popup real time appointment requests
* Designed a few clever geographic functions in SQL Server, to handle queries for finding doctors within a range of 5 to 500 miles. Also coded entire backend and logic of system.
* Converted entire MVC application to use Angular.js and AJAX to improve response times and user experience.
* Created a web version of the customer search page in Unity3D, installed locally for offline usage. This allowed users to search and display patient information when the internal network went offline.

**Skills:** C# 4.0, ASP.NET, MVC, Medical, Web, Database Design, SQL Query Optimization, Object Oriented Design, Application Security Design, jQuery and Angular Frameworks, Entity Framework 4.5, LINQ to SQL / Objects, SQL Server 2008 / 2012

**ADP - Architect-Senior Developer IV September 2010 - July 2012**

**Ft Lauderdale, FL**

Clients Included: **Ford, Toyota, Assurant, GM** and several large banks

**Description:** Redesigned and architected the core of MenuVantage, the company’s main income producing application, which provides **automotive warranty products to over 65% of auto dealerships in the US**.

* Previously, the entire system previously depended on a local database and 100 separate DLLs. I functioned as the lead in redesigning the application to run on a Cloud based API. This eliminated several years of development done by a team of 5 developers and saved over $500,000 a year in maintenance costs.
* Took the system from design, to coding, extensive testing and deployment. Over a 6-month period new products and partners increased sales by 20%.
* Prototyped and built out a new API based contract system, which later was further developed by a team of 6 developers for handling **third party** **automotive products (engine, window, tire products)** sold in the MenuVantage application.

Skills: C#, ASP.NET 3.5 -4.5, Enterprise Architecture, WCF and Web Services, Database Design, SQL Server 2008 / 2012, LINQ to SQL / Objects / XML, JavaScript & jQuery, Multi-Threading in C#, Visual Studio 2010, TFS

**Liberty-Power-Senior Web Developer June 2009- September 2010**

**Ft. Lauderdale, FL**

* Working from 120-page spec document, coded an application to collect electrical information including usage files for submission to a pricing engine.
* Added automated testing procedures, coordinated with the business department and passed the application to QA.

**Skills:** C#, Object Oriented Design, LINQ to SQL / Objects / XML, SQL Server 2005 / 2008, XML, ASP.NET 3.5, Visual Studio 2008 TFS, Microsoft Unit Testing, MVC

**Candid Clubs- Application Architect January 2008 -January 2009**

**West Palm Beach Florida**

* Build a Web streaming system for Nightclubs with social networking functionality.
* Starting from paper prototypes and discussions with business owner, created prototypes for streaming audio and video without the need for an installation program.
* After research and testing, coded a flash-based broadcasting application using a third-party site to supply streaming bandwidth.
* Designed and coded pages with help from the graphics department. Built front end to handle customer signups and social functions including sharing of nightclubs, uploaded images, ratings and other common social networking features.

**Skills:** C#, ASP.NET, Themes, SharePoint Web Parts, Object Oriented design, Application Security design, SQL Server 2008/2012

**Saveology - Senior Developer - Lead Architect July 2006 - July 2008**Clients Included: Comcast, Time-Warner, Cox and Charter

**Fort Lauderdale, Florida**

* As the lead Architect responsible for 5 developers at this Cable reseller, I built most of the applications which together became their primary source of income.
* Within a single year, sales went from zero to grossing over $200,000 per day and 8000 unique hits daily
* Worked from Cable company specs to create ASP.NET Web service-based application that consumed SOAP responses containing Cable company Product and Prices in XML Format.
* Expanded the system to 5 websites to handle customers for Comcast, Timer Warner, Charter and Cox Communications
* Coded Shopping cart, customer service pages, and telephony integration used by 300 personnel.
* Conducted technical interviews to expand team and responsible for production deployment and support in emergencies

**Skills**: C#, ASP.NET, SQL Server 2000/2005, XML, N-Tier Development, Visual Studio 2005 -2008 Source Control, Microsoft Application Blocks 2.0, Telephony and Chat Integration

**Lexis Nexus Senior Developer March 2005 - June 2006**

**Boca Raton, Florida**

* Built a competitive analysis application for collecting and comparing the data products available from competing firms for determining market opportunities.
* Worked with business analysts to create specification and prototype pages.
* Created pages and database tables to allow business users to load in competitor information.

**Skills:** C#, ASP.NET, Data Mining, Prototyping, Database coding, Object Oriented Design, Application Security Design

**Media Thrill - Application Architect March 2004 –2005    
Doral, Fl**

**Description:** E-commerce company selling DVD and CD-ROM using Amazon Web Services.

* As the primary software developer in charge of all code and databases, I took the system from VB6 to VB.NET and added many improvements to the code such as logging, error handling, testing, and added database tables to support these functions.
* Rewrote the code for screen scraping and placing orders into the partner websites using VB.NET and ASP.NET.
* Rewrote most of the central code systems into an ASP.NET object-oriented style with reusable layers for database code, error handling and business logic. Previously the code was written as client/server VB6 style.

**SKILLS:** Amazon Web Services, ASP to ASP.NET, VB.NET Socket controls, SQL Server 2000 / MSDE, XML, N-Tier Development, Multi-Threading in C#

**Assurant - Senior Web Developer November 2002 - March 2004**

Homestead, Florida Large Scale Specialty Insurance Provider

* As part of the architecture team - Led and mentored a team of 10 developers in the design/coding of an enterprise scale application for appliance warranties
* Coded a series of business components for managing extended service warranty insurance products for several countries
* Designed and coded a reusable Translation component to translate system messages and the text within any page or control
* Coded methods to use reflection and inheritance to translate all pages behind the scenes, written in VB.NET
* Designed and coded a Security component to manage and apply security on every object within the system

**SKILLS:** Use Cases, UML Modeling using Rational, NUnit-automated test, peer code reviews, Multi-layer object oriented design, , VB.NET 2.0, SQL Server 2000/2005, ASP.NET, Source Safe.

**Rexall Sundown - Senior Developer April 2001 - February 2002**

Boca Raton, Florida Manufacturer- Vitamins/Supplements

**Description:** At this vitamin supplement manufacturer, I was the technical lead/developer for all web development projects within a team of 8 developers. All development was done in ASP.NET.

* Coded all database driven websites and various sweepstakes shown on TV during Metrx Strongest Man Contest.
* Designed and coded a web-based security system that used ADSI and Active Directory to validate users and membership in ASP.NET
* Created a Chat application that combines FLASH and .NET socket functions to allow users to chat with each other in real time.