

Transition into Tech - in Germany

We use tech to connect human potential and
opportunity with dignity & humility



Our journey today

- Current situation in the tech market
- Types of employment in Germany
- Your contract
- IT Career tracks and average salaries
- Websites where you can find jobs
- Networking
- Q&A

Current situation in the tech market

Current Situation in the tech market



According to Germany's own Federal Employment Agency, **the country needs over 400.000 skilled migrants to arrive every year** in order to feed its demand for labor

- ❖ Germany is the largest software market in Europe
- ❖ About 6000 new innovative companies are created in Germany every year
- ❖ Berlin and Munich are the most attractive cities for tech talents
- ❖ In 2023, more than **149.000 jobs** were open in Germany (in 2015, when ReDI was founded it had been 43.000)
- ❖ **BUT:** Current Situation a bit more challenging due to slow growth in GER and instable global economic and political situation- Companies are very careful at the moment.
- ❖ **Don't Worry: Qualified and motivated people always have a great perspective!**

Read more here: <https://www.expatrio.com/about-germany/working-germany>
<https://www.bitkom.org/Presse/Presseinformation/Rekord-Fachkraeftemangel-Deutschland-IT-Jobs-unbesetzt>

Why are companies lacking so many employees?



- ❖ “War” for talents
- ❖ Growing complexity and ever-changing job profiles
- ❖ With Digital Transformation IT is no longer just an enabler or supporting function for business but **THE** driving force for new business (e.g. new business models, customer experience, Gen AI)
- ❖ Emerging new technologies, constant learning (**Artificial Intelligence**)
- ❖ University and other classical learning facilities cannot adapt to change so quickly (need for lifelong learning)
- ❖ Less and less graduates in IT from universities

The main working conditions in IT field

-  Flexible working hours (Generally about 40h per week)
-  Work from any location (Mostly mix of remote and office work)
-  Sports and leisure activities
-  Flat hierarchies
-  English as company language and international company culture **BUT** German a great PLUS!
-  Good salary (we will see approx. salaries later in the presentation)

Types of Employment in Germany

What types of employment contracts do you know?

There are:

A permanent employment contract

(*unbefristeter Arbeitsvertrag*)

Role has no fixed end, but is offered on a long-term basis.

A fixed term contract

(*befristeter Arbeitsvertrag*)

Role in which an individual is only required for a certain time frame

Mini-Job

Low-paid, low-skilled, part-time roles that have a salary of up to €538 per month. In a minijob contract, the employer pays just some or none of the pension insurance contribution (upon request), which is subsidized by the government.

Contract with a recruitment agency

Some employers work with third-party recruitment agencies to find staff. In many short-term, temporary roles, individuals are actually hired by the recruitment company.

Freelancer Contracts

You can offer your professional services to a range of businesses. Freelance work is less secure, but more flexible. Freelancing involves being responsible for your own tax and health insurance contributions.

What you should find in your employment contract

Your ideas?



Name and address

Yours and that of the company

Date on which the contract starts

The date on which you officially become an employee of the company (this means: starting from which date is the contract valid?).

Term of contract

Is your contract only valid for a certain period of time? When does it end? The term of the contract must be agreed in writing, otherwise it is considered to be valid for an undetermined period of time.

Trial period

How long does the trial period last?
This is the period during which you or the company can terminate the contract relatively quickly.

Place of work

Where will you be working? If you are to work in different places, this should be stated in the contract.

Job Description

What tasks will you be expected to do in the company?

Working hours

How many hours a week will you be expected to work?

Holiday

How many days' leave are you entitled to per year?

Notice period

How long in advance must you notify the company, or the company notify you, that the employment contract is going to be cancelled?

Remuneration

How much will you be paid for your work? Will the company pay you supplements or bonuses, for example at Christmas or for working weekends, on top of your normal pay? When does the company pay you – for example, at the end or beginning of the month?

Note: The employment contract usually states the gross pay.

Collective bargaining agreement and works agreement (addition)

Often, in addition to the employment contract, special regulations also apply. For example, in many branches of industry, employer associations and trades unions have reached collective bargaining agreements. These agreements may regulate questions of remuneration, bonuses or holidays. Companies can also sign special agreements with their Employee Councils, which represent the interests of the employees. These are called works agreements. You can ask your employer if these agreements also apply to you. This may also be stated in your employment contract.

Possible Career tracks and average salaries

Data Analysis

Data Analysis

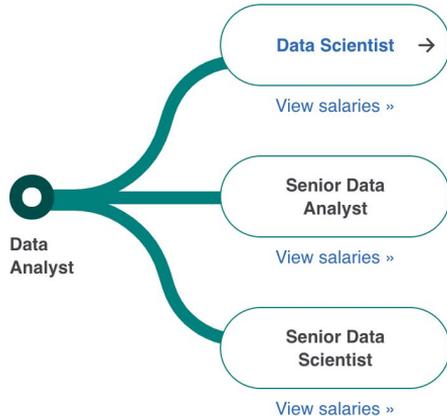
Job	Description
Business analysts	Work to analyze data related to their specific business or organization, as well as the industry that they operate within.
Budget analyst	Is responsible for preparing budgets, monitoring spending, and otherwise organizing and reporting on the finances of the organization.
Compensation and benefits analysts	Are typically a part of the broader human resources (HR) team. They conduct analysis to inform compensation packages, and may also be concerned with metrics such as employee turnover.
Marketing analysts	Analyze the organization's various marketing channels in order to identify areas of strength and weakness.
Product analysts	Focus their efforts on specific products or product lines, determining the characteristics that consumers expect and desire in a product as well as advising on factors such as pricing.
Sales analysts	Regularly analyze an organization's sales activities, including their volume of sales and the shape of their overall sales pipeline, in order to better support and optimize the sales team.

Data Analysis

Average salary for junior position
(based on payscale.com)

€39,791 / year ▼

Avg. Base Salary (EUR)



More common (> 20%) Somewhat common (8 - 20%) Less common (< 8%)

Skills for Junior position (could be different, based on company)

Example 1

- Hands-on experience in data analysis, data profiling, data management, and data quality management and conducting ad hoc analysis
- Very good knowledge of common office applications, specifically Excel and Google Sheets, and basic knowledge using SQL, Python, and R
- Go-getter, with strong verbal and visual communication skills, proactive, detail-oriented with strong analytical acumen, and willing to go the extra mile

Example 2

- Good grasp of SQL and relational databases
- Analytical mindset, high attention to detail, strange obsession with automation
- Ability to research and solve technical challenges
- Ability to translate business problems into effective data solutions
- Ability to see the bigger picture and prepare your analysis outputs to always address the business question posed
- Excellent English communication skills

Data Science

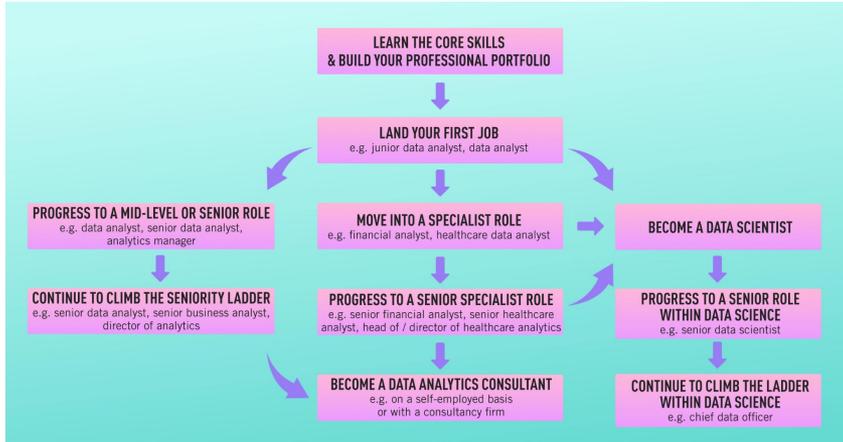
Data Science

€55,384 / year ▼

Avg. Base Salary (EUR)



The average salary for a Data Scientist is €55,384



Skills for Junior position (could be different, based on company)

What you'll definitely need:

- At least 1 year hands-on experience in an analytics related field.
- An exceptional understanding of data analysis and statistics and experience working in either an academic or professional context.
- Proficiency programming in either Python or R and relevant data manipulation packages.
- Some experience working with SQL.
- A strong belief that high quality data science work can only be achieved by understanding the fundamentals, being meticulous, and paying attention to details.
- Motivation to continuously learn more about data science and adjacent fields (such as mathematics, software development, and business development), and to share those insights with a team of equally motivated data scientists.
- Excellent communication skills (both verbal and written), confidence in presenting ideas and findings to stakeholders, and ability to do so at the right level of detail.

Difference between data analytics and data scientist

Data Scientist

also known as Data Managers, statisticians.



A data scientist will be able to take data science projects from end to end. They can help store large amounts of data, create predictive modelling processes and present the findings.

Skills: Mathematics, Programming, Communication



Will use programmes such as:
SQL, Python, R

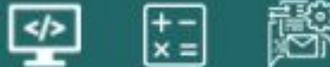
Data Engineers

also known as database administrators and data architects.



They are versatile generalists who use computer science to help process large datasets. They typically focus on coding, cleaning up data sets, and implementing requests that come from data scientists.

Skills: Programming, Mathematics, Big data



Will use programmes such as:
Hadoop, NoSQL, and Python

Data Analysts

also known as business Analysts.



They typically help people from across the company understand specific queries with charts.

Skills: Statistics, Communication, Business knowledge



Will use programmes such as:
Excel, Tableau, SQL

Web Development

Web Development



Job	Description
Front End Engineer	“Front end” includes all customer-facing features of a website or app: text fields, images, buttons and banners. These engineers program the interface users engage with. HTML, CSS and JavaScript are all front end coding languages
Back End Engineer	Back end engineers build the mechanics of how a site processes information. They determine how the site will communicate with servers, and how to collect, store and manage user data. Ruby, PHP and Python are some of the most common languages for back end development.
Full Stack Engineer	It’s someone who knows multiple languages and can successfully build both front and back ends of a site. These expert programmers are able to guide the user flow, as well as how the data is transmitted to servers.
Software Architect	An experienced programmer who leads the development team. They make high-level decisions about design and functionality, and create standards and tools for the department.

Read more here: <https://www.thinkful.com/blog/web-development-career-path/>

Requirements for Junior positions

Skills for Junior full stack position (could be different, based on company)

- You have successfully completed your studies in software engineering or an equivalent qualification
- You already have great experience in software development in a start-up or enterprise environment
- You are able to master Javascript ES6/ES7, HTML 5/CSS/SASS, NodeJS, Git, Webpack/, APIs, HTTP APIs/Websockets, JS Test Frameworks, mongodb
- You can learn languages quickly if you have the desire to
- You are passionate about optimizing processes and taking over responsibility

Skills for Junior back end position (could be different, based on company)

- Passion for learning and challenging the status quo
- Experience in software design and development, preferably in a web-service environment
- Knowledge in designing and building APIs
- Experience working in an agile environment is a plus
- Experience in cloud-based architectures is a plus
- Knowledge in Spring ecosystem is a plus
- Fluency in English is a must

Skills for Junior front-end position (could be different, based on company)

- You're an enthusiastic frontend developer and you know your web technologies (HTML5, CSS3, JavaScript, SASS)
- You have advanced knowledge of React.JS
- You're comfortable with SQL databases (PostgreSQL, MySQL, MS SQL, SQLite)
- You don't mind interacting with your colleagues and sharing your ideas and skills
- You've got a good level of English
- Maybe you're even familiar with some of these computational concepts / technologies: RESTful APIs, OpenAPI, Node.JS, Hapi.JS, TypeScript, Sequelize, Material-UI, Jenkins, QT Framework (C++), quality assurance, UX methods, responsive Design, Scrum, version control (GIT), natural language processing, software engineering.

UX/UI

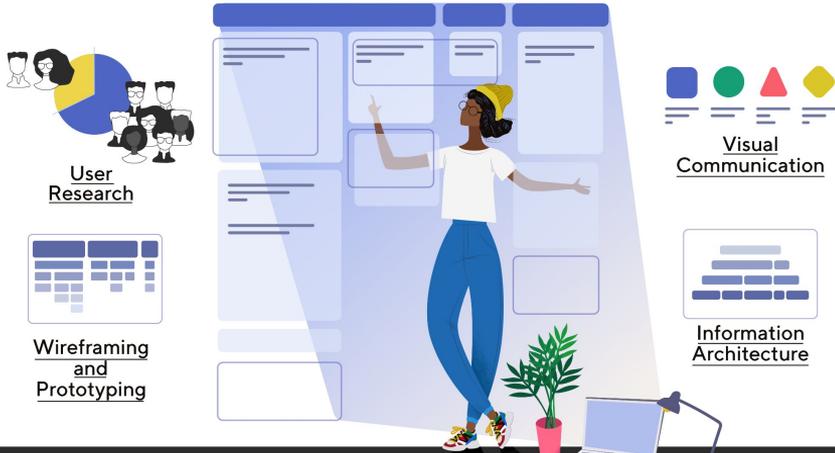
UX/UI

Average Base Pay

€50,677 /yr



Top Skills for UX Designers



Skills for Junior UX/UI position (could be different, based on company)

- You will work on mobile app UX/UI projects from start to finish: identifying and prioritizing problems, performing iterative design exploration and validations, and executing design outcomes.
- Through customer and competition research, you will iterate on new feature development and technical improvements with the Design, Product and Tech teams.
- You will mainly create and maintain high-quality design deliverables including wireframes, prototypes, style guides, site structure, flows, components and assets.
- You will assist the engineering team throughout feature implementation, ensuring UX coverage.

Required skills:

- good knowledge of design tools (Adobe Creative Cloud, Sketch, Affinity Designer)
- creative and excited about website and app design
- cloud-based communication and management tools (docs, drive, slack...)
- solid communication skills in English

UX/UI - Possible career paths

Technical Career Progression

If you're passionate for web technologies and love HTML, CSS, and JavaScript, then future in **front-end web development** could be perfect.

You also have the option of learning new languages like Python, Ruby, and PHP to transition into a full-stack developer.

With the recent growth in mobile tech, you might also want to consider **mobile development, app design, or even video game design.**

Managerial Career Progression

You can work your way up from UX designer to UX manager and then to UX director. This path can also lead you to become the VP of user experience.

Web Design

Web Design

€40,888 / year ▼

Avg. Base Salary (EUR)



Skills for Web Design junior position
(could be different, based on company)

Visuals, Storytelling and fitness are your passion. You are on top of current Web Design trends and best practices and you have a proven track record in designing a Website or Social Media Creatives. Your work is shaped by high quality, accuracy and creativity. Moreover, you know the basics in HTML, CSS and Shopify's Liquid and you are proficient in using Adobe Creative Cloud, Sketch and Figma. Besides this, you are a very emphatic, open-minded and proactive person with a solution-oriented mindset. You also like working in a dynamic, fast-paced environment and you are ready to get out of your comfort zone every single day. Lastly, you are fluent in English and German - further language skills are a plus :)

Skills for Web Design position
(could be different, based on company)

What we expect from you:

- Excellent written and verbal communication skills; English is a must, German a preference
- Previous experience in the field of web development or web design (internship, self-employed or through previous employers)
- A proactive roll-up-your-sleeves attitude
- The ability to project and prioritize deadlines

When applying, please include your resume and a portfolio with relevant experience.

Web Design - career paths

Start your career as an intern or in a junior designer position.

After six to twelve months: you'll be slowly given more tasks and start to work independently and could be promoted to a web designer. Your designs will need to be approved by senior members, but you'll become more involved in client meetings.

After gaining a few years: senior web designer where you'll be given more design freedom.

You then have the option of entering into a managerial role where you'll lead a design team, recruit new designers, and make key decisions on the project. **You could also transition into the role of a UX designer or back-end developer.**

After gaining more experience you can become a **creative director or senior manager.**

Salesforce

Salesforce Administrator

Average Base Pay

€43,122 / yr



Career paths



Skills for Salesforce admin position
(could be different, based on company)

- a Salesforce Certified Administrator (SFCA)
- excellent knowledge and deep of: Workflows, Process Builder, Validation Rules, Formulas, Permission and Sharing Model
- basic understanding of Salesforce coding with APEX
- strong analytical business process development skills and problem solving skills
- strong communication skills in English and teamwork spirit, German is also a plus

Salesforce Administrator level

Junior Admin

0 – 2 years experience (possibly up to 3 years). Maintaining the Salesforce org on a day to day basis, acting as the first line of support for users

Mid-level

2 – 4 years experience. Maintaining a fairly complex Salesforce org (more users, a more complex sharing model, integrations and/or using less common features), customizing Salesforce using best practices

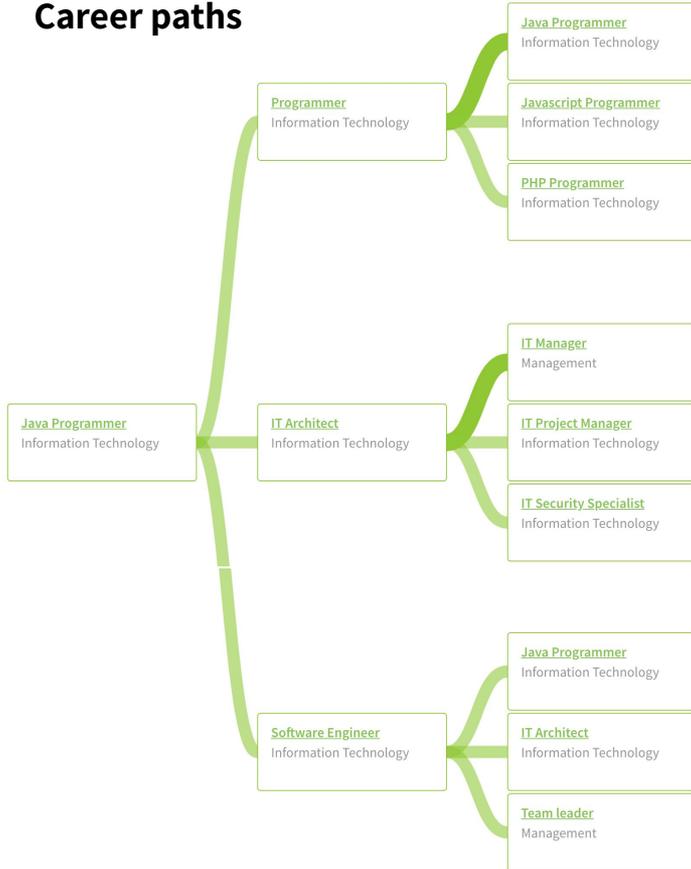
Senior Admin

5+ years experience. Maintaining a complex Salesforce org, managing a team or working with external parties carrying out a number of releases per year. Have stakeholder management skills, responsible for governance

Java Development

Java Programmer

Career paths



€49,185 / year ▼

Avg. Base Salary (EUR)



The average salary for a Java Developer is €49,185

Skills for Junior java developer position (could be different, based on company)

- You have a good knowledge of Java web technologies and Spring Boot, at best you already have gained your first experience with Freemarker/JSP, Hibernate, Elasticsearch, Solr or Maven as well as basic knowledge of HTML/CSS and Javascript.
- You have some experience with Linux as development environment.
- You know how to write “clean code” and test it (JUnit).
- Ideally you already have gained first experience with REST services, Continuous Delivery or Kubernetes.
- You like to take on responsibility, you are open to new ideas and technologies and you want to develop your skills. Very good English skills complete your profile.

Java Programmer

Skills for Junior java developer position (could be different, based on company)

You should apply if

... you have decent Java coding skills, although industry experience is not required

Beyond that, we recognize that you may need further development in some areas, and we encourage you to apply even if your profile does not meet all of the requirements for the role: we encourage and support growth and development for everyone. That said, prior experience in any of the following areas will be beneficial:

- Big data processing technologies such as Kafka and Solr
- Databases such as PostgreSQL and Redis
- Deployment infrastructure of scalable cloud applications such as Docker, Kubernetes, and Zookeeper
- Continuous integration technologies such as GitHub Actions and Jenkins

Skills for Junior java developer position (could be different, based on company)

What we need to see from you:

- Interest in IT and a desired career as a developer
- You have (or soon will have) a degree or apprenticeship in the IT field
- You have advanced Java knowledge, every additional language is an advantage
- You are fluent in English and have German skills (at least B1 level and eager to improve)
- You are a European citizen or have a resident and work visa, as we do not sponsor visa and do not fulfill criteria for you to get a EU blue card
- You have good analytical skills, an affinity for numbers and a high ability to learn
- You are creative, enjoy solving problems and are a team player

How to find job/internships

Look for a job here

Websites

<https://www.stepstone.de>

<https://www.monster.com>

<http://berlinstartupjobs.com>

<https://de.indeed.com>

<https://www.glassdoor.de>

<http://www.jobsinberlin.eu>

<http://www.germanystartupjobs.com>

<https://4scotty.com>

<https://4scottyjuniors.com>

<https://Open.hpi.com>

<https://Learning.sap.com>

Platforms

<https://www.talent.io>

<https://angel.co>

<https://truffles.de/en>

<https://www.monster.com>

<https://www.get-in-it.de>

[Linkedin.com](https://www.linkedin.com)

[xing.com](https://www.xing.com)

<https://www.wearedevelopers.com/devjobs>

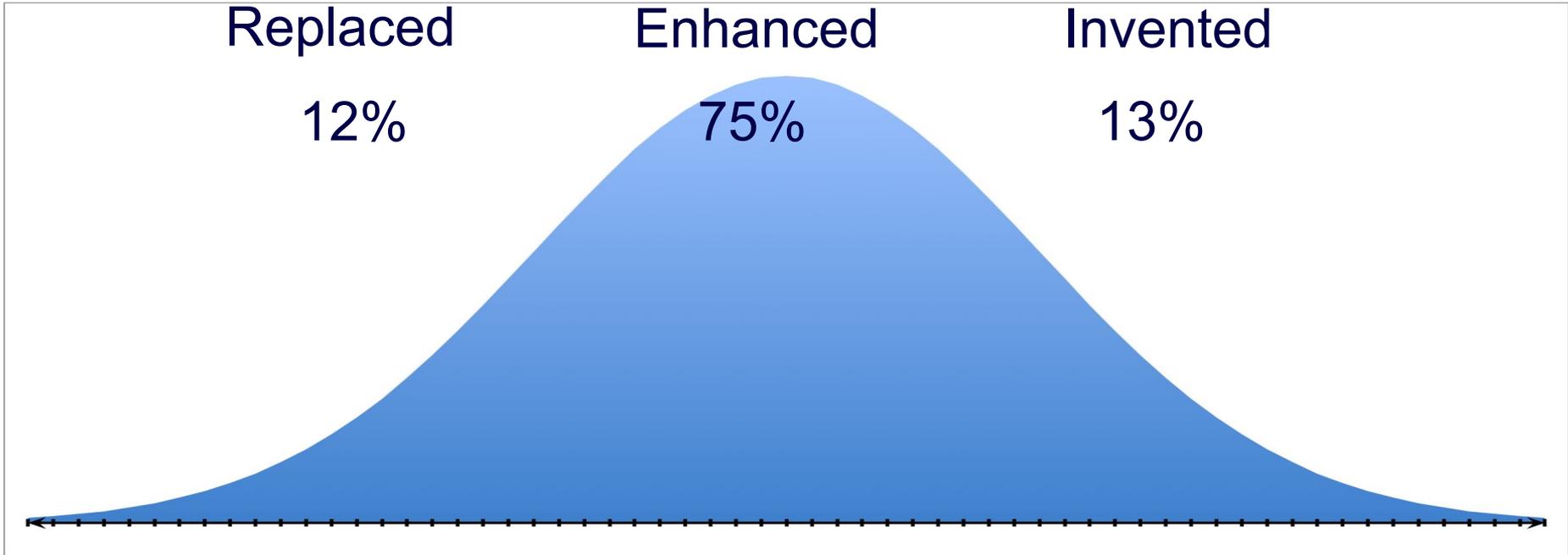
<https://www.taledo.com>

[Stackoverflow.com](https://www.stackoverflow.com)

<https://www.honeypot.io>

Artificial Intelligence

How AI will change the Job Market



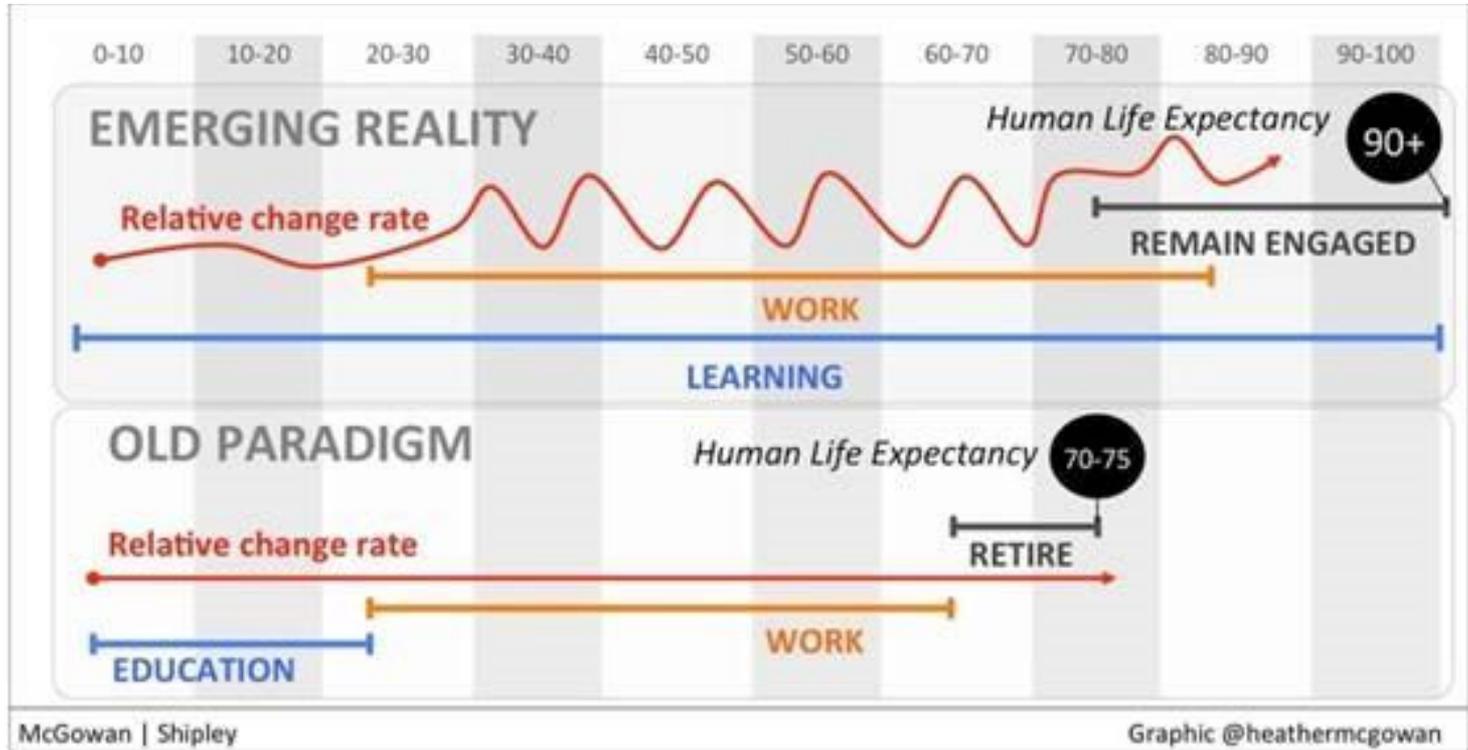
Three common themes



Double down on human-centric skills



Lifelong LEARNING!



Three things to remember

1. Technology is changing work at incredible speed. The skills we need to succeed are changing fast - it's everyone's job to keep learning.
2. Jobs for everyone! Work of the future isn't just for the techies.
3. Humans are still at the centre of work: remember – coaching, connecting, caring

NETWORKING! NETWORKING! NETWORKING!

- ❖ Go to **network events** (MeetUp.com, eventbrite.com) and get to know companies, other developers, job profiles, current trends
- ❖ Attend different career talks
- ❖ **Research and discuss** technical challenges on platforms such as Stackoverflow and Github
- ❖ Put up a **professional profile** on business networks like LinkedIn and XING (recruiters will find you!)
- ❖ Put the **projects** you are proud of on Github, build your own website, portfolio
- ❖ **Apply for a mentor (see next slide)**