DEPARTMENT OF INFORMATION SCIENCE
INDIVIDUAL ASSIGNMENT COVER PAGE

Name of Student	Wisani Nkuna
Student Number	u19096527
Name of Module	Advanced Programming
Module Code	INF 272
Name of Lecturer	Mr JP van Deventer
Title of Assignment	Homework 04
Date of Submission	21 August 2022
Declaration: I declare that this assignment, submitted by me, is my own work and that I have referenced all the sources that I have used.	
Signature of Student	

Date received	
Signature of administrator	

Mark	
Date	
Signature of Lecturer	

USE CASE NARRATIVES

UC 1.1 – CREATE CLIENT PROFILE

System Name: Labour Search Application					
Author:	Wisani Nkuna	**Date:**		**Version:**	
Use Case Name:		Create Client Profile		**USE CASE TYPE**	
Use Case ID:		1.1		Business Requirements	
Priority:		High		System Analysis	⊗
Source:		Case Study		System Design	
Primary business actor:		Client			
Primary system actor:		Client			
Other participating actors:		none			
Other interested stakeholders:		none			
Description:		The user creates a "Client" account and enters all prompted personal details.			
Pre-condition:		The user doesn't have a "Client" account on the system. The user wants to look for a professional near by.			
Trigger:		The user clicks on "Create Client Account" link			

UC 1.2 – ADD JOB POST

System Name: Labour Search Application					
Author:	Wisani Nkuna	**Date:**		**Version:**	
Use Case Name:		Add Job Post		**USE CASE TYPE**	
Use Case ID:		1.2		Business Requirements	
Priority:		Medium		System Analysis	⊗
Source:		Case Study		System Design	
Primary business actor:		Client			
Primary system actor:		Client			
Other participating actors:		Professional User			
Other interested stakeholders:		none			
Description:		The user adds a new Job Post. The user enters all the Job post required fields and posts it to the Professionals portal.			
Pre-condition:		The user has an account and is logged in.			
Trigger:		The user clicks on "Add new" button			

UC 1.3 – VIEW JOB POST REPLIES

System Name: Labour Search Application					
Author:	Wisani Nkuna	**Date:**		**Version:**	
Use Case Name:		View Job Post Replies		**USE CASE TYPE**	
Use Case ID:		1.3		Business Requirements	
Priority:		Medium		System Analysis	⊗
Source:		Case Study		System Design	
Primary business actor:		Client			
Primary system actor:		Client			

Other participating actors:	Professional User
Other interested stakeholders:	none
Description:	The user selects to display replies to posted Job Post.
Pre-condition:	The user has posted a Job post
Trigger:	The user selects "View Messages"

UC 2.1 - CREATE PROFESSIONALS PROFILE

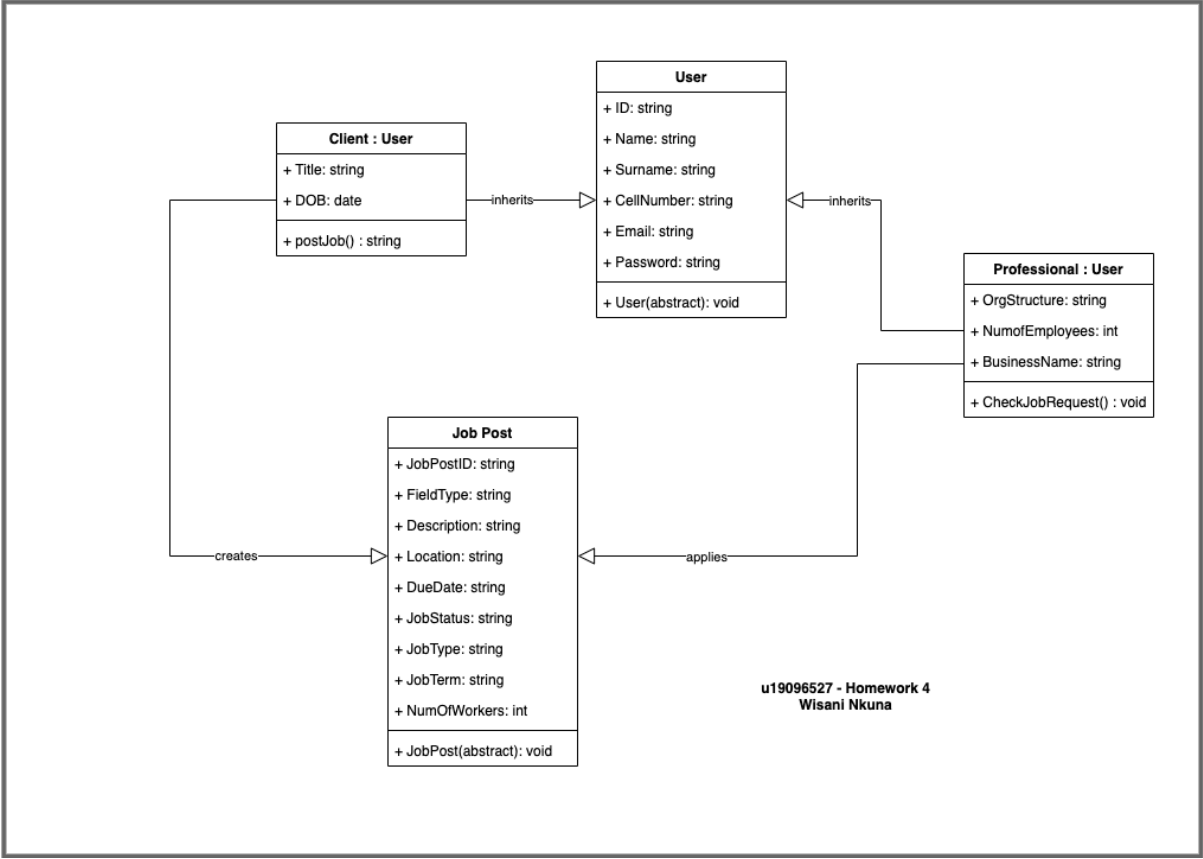|				
System Name: Labour Search Application				
Author:	Wisani Nkuna	**Date:**		**Version:**
Use Case Name:	Create Professionals Profile		**USE CASE TYPE**	
Use Case ID:	2.1		Business Requirements	
Priority:	High		System Analysis	⊗
Source:	Case Study		System Design	
Primary business actor:	Professional			
Primary system actor:	Professional			
Other participating actors:	none			
Other interested stakeholders:	none			
Description:	The user creates a Professional user account. The user enters all the information about their business or independent services.			
Pre-condition:	The user doesn't have a "Professional" user account. The user is a professional looking to offer services			
Trigger:	The user selects "Create Professional Account"			

UC 2.2 – VIEW JOB POSTS

System Name: Labour Search Application				
Author:	Wisani Nkuna	**Date:**		**Version:**
Use Case Name:	View Job Posts		**USE CASE TYPE**	
Use Case ID:	2.2		Business Requirements	
Priority:	Medium		System Analysis	⊗
Source:	Case Study		System Design	
Primary business actor:	Professional			
Primary system actor:	Professional			
Other participating actors:	Client User			
Other interested stakeholders:	none			
Description:	The user selects "View Job Posts". The system displays all recent Job Posts.			
Pre-condition:	The user has a "Professional" account and is logged in			
Trigger:	The user selects "View Job Posts".			

UC 2.3 – CHECK JOB POST REQUESTS

System Name: Labour Search Application				
Author:	Wisani Nkuna	**Date:**		**Version:**
Use Case Name:	Check Job Post Requests		**USE CASE TYPE**	
Use Case ID:	2.3		Business Requirements	
Priority:	Medium		System Analysis	⊗
Source:	Case Study		System Design	
Primary business actor:	Professional			
Primary system actor:	Professional			
Other participating actors:	Client User			
Other interested stakeholders:	none			
Description:	The user selects the "Check Job Post Requests". The system display all job posts the user has requested to complete.			
Pre-condition:	The user requested to offer services on one or more job posts.			
Trigger:	The user selects the "Check Job Post Requests".			

CLASS STRUCTURE DIAGRAM

User

+ ID: string

+ Name: string

+ Surname: string

+ CellNumber: string

+ Email: string

+ Password: string

+ User(abstract): void

Client : User

+ Title: string

+ DOB: date

+ postJob() : string

—inherits—▷

◁—inherits—

Professional : User

+ OrgStructure: string

+ NumofEmployees: int

+ BusinessName: string

+ CheckJobRequest() : void

Job Post

+ JobPostID: string

+ FieldType: string

+ Description: string

+ Location: string

+ DueDate: string

+ JobStatus: string

+ JobType: string

+ JobTerm: string

+ NumOfWorkers: int

+ JobPost(abstract): void

—creates—▷

◁—applies—

u19096527 - Homework 4
Wisani Nkuna

MOTIVATION

SDG GOAL:

The Sustainable Development Goal I've selected is Goal 8: Decent Work and Economic Growth. I choose to focus on the sub-goal, "support sustained, inclusive, and sustainable economic growth, full and productive employment, and decent work for all."

WHY DID I CHOOSE THIS SDG GOAL?

I chose this goal because I felt moved by the current unemployment plight in my country South Africa. According to the South African Department of Statistics, the *official unemployment rate was 34,5% in the first quarter of 2022.* The number of unemployed people decreased by 60 000 to 7,9 million in the 1st quarter of 2022 compared to the previous quarter – this only decreased the official unemployment rate by 0,8% from 35,3% in the fourth quarter of 2021 to 34,5% in the first quarter of 2022.

Unemployment has been normalised and its challenging for our leaders to come up with solutions that can take us forward. Unemployment has now become a generational task, the generation before us went to school to learn how to get a job, and now we see the youth tasked with going to school to learn how to create jobs which is a lot of pressure. As much as we rely and motivate entrepreneurs, it is still hard for them to make their business work to a point where they can create effective mass job creation.

NPO I HAVE IDENTIFIED:

SiyaBonga Africa

MOTIVATION FOR NPO:
Why would this NPO want this?

Siyabonga Africa is a registered South African Non-Profit Organisation and Public Beneficiary Organisation, committed to eradicating poverty and bringing about positive change for the people of our country. They address a few SDG goals but mainly Goal 1 (No poverty) and Goal 8 (Decent Work and Economic Growth).

Siyabonga Africa has a Job Creation programme whereby they help small business owners become players in the local economy with their business registration and finance matters. They are committed to helping small and micro business owners, whether formal or informal in nature. They also help qualified trained individuals find jobs by linking to prospective employers.

How does my application address the SDG goal for the NPO?

My application serves as a Labour Search Application mainly for small and micro-businesses. It also caters to clients looking for a professional to offer domestic labour jobs they need like gardening, plumbing, etc.

My application aims to connect its users to professionals they are looking for. Individuals can post domestic jobs hoping to find a professional near them. Small and micro businesses can post non-domestic jobs hoping to find future employees or a freelancer to help them for a short time. Tender receivers and entrepreneurs can also create a profile and use the application to look for a few extra hands or a few permanent employees.

The goal is connecting job seekers to short-term and long-term jobs that can lead to future employment. Most career platforms focus on corporate desk jobs, this application aims to focus more on labour intensive job seekers and connecting them to a few potential jobs.