Assignment: In this project, you'll create a security infrastructure design document for a fictional organization. The security services and tools you describe in the document must be able to meet the needs of the organization. Your work will be evaluated according to how well you met the organization's requirements.

About the organization: This fictional organization has a small, but growing, employee base, with 50 employees in one small office. The company is an online retailer of the world's finest artisanal, hand-crafted widgets. They've hired you on as a security consultant to help bring their operations into better shape.

Organization requirements: As the security consultant, the company needs you to add security measures to the following systems:

An external website permitting users to browse and purchase widgets

An internal intranet website for employees to use

Secure remote access for engineering employees

Reasonable, basic firewall rules

Wireless coverage in the office

Reasonably secure configurations for laptops

Since this is a retail company that will be handling customer payment data, the organization would like to be extra cautious about privacy. They don't want customer information falling into the hands of an attacker due to malware infections or lost devices.

Engineers will require access to internal websites, along with remote, command line access to their workstations.

Grading: This is a required assignment for the module.

What you'll do: You'll create a security infrastructure design document for a fictional organization. Your plan needs to meet the organization's requirements and the following elements should be incorporated into your plan:

Authentication system

External website security

Internal website security

Remote access solution

Firewall and basic rules recommendations

Wireless security

VLAN configuration recommendations

Laptop security configuration

Application policy recommendations

Security and privacy policy recommendations

Intrusion detection or prevention for systems containing customer data