

## Central heating and gasnetworksystem fitter B1

### I. Reading Comprehension Tasks

*Task 1: What types of alternative heating solutions have you heard about? Use the Internet to find alternative heating sources.*

*Task 2: Read the text about solar heating. You can ask help from your teacher or consult a dictionary.*

#### Heating with gas and solar – highly efficient and futureproof

The use of solar energy ranks among the most environmentally responsible energy conversions imaginable. In addition, the government is currently committed to investing in these kinds of systems. For the latest information on subsidy programmes, contact your local heating contractor or refer to the product information section on this website.

Using the sun to save energy

Thanks to freely available solar energy, detached or two-family houses with a solar thermal system can now save up to 35 percent on heating costs in if using solar collectors both for central heating backup and DHW heating. This can cover up to 60 percent of the annual energy demand for DHW heating.

Example: Modern detached house

Heat is generated by a gas condensing boiler and is distributed throughout the interior either by radiators or underfloor heating. In addition, a solar thermal system with an approx. 5 m<sup>2</sup> absorber area is used for DHW heating. The living area is approximately 140 m<sup>2</sup>.

Which heating system is the best for you?

Take advantage of these benefits

Gas condensing technology

- Nothing is as efficient as condensing technology in the field of energy conversion – it achieves energy utilisation of up to 98%
- Thanks to low investment outlay, the system will pay for itself in only a few years

- High alloy stainless steel is used for all condensing boilers and heat exchangers. This guarantees high operational reliability and a long service life
- Condensing boilers from Viessmann are already prepared for the use of LPG.

#### Solar thermal

- Solar energy is available free of charge
- A solar thermal system offers greater independence from fossil fuels.
- Energy is converted without harmful CO<sub>2</sub> emissions
- A solar thermal system is the perfect addition to any heating system: It can be used for DHW heating and central heating backup in spring and autumn.
- All solar collectors stand out on account of their high operational reliability and long service life.

**Task 3:** Read the above text again and answer the questions.

1. For what types of houses is solar energy available?
2. What percentage can you save up by using solar collectors?
3. How is heat generated in a modern detached house?
4. What kind of material is used for condensing boilers and heat exchangers?
5. What's the problem with fossil fuels?
6. What's the best in solar energy?

## II. CV Tasks

***Task 1:** Read the following advertisement and the resume sample of a gas technician who applies for the job. Try to understand it. You can use a dictionary.*

### Gas Technician Resume Samples

A Gas Technician works in residential, commercial, and industrial settings. A well-drafted Gas Technician Resume indicates the following duties and responsibilities – installing, repairing, and maintaining gas meters, regulators, gas lines, and gas appliances; testing for gas leaks; working on boilers, ovens, gas fireplaces, hydronic heating systems, etc. installing and connecting appliances to gas, water, and electrical supplies; retrofitting; testing and replacing defective equipment or components; educating clients on safety features and maintaining gas units and systems.

To qualify for this role, the individual should obtain a recognized qualification of the gas industry such as Level 3 NVQ in natural gas installation and maintenance, or a level 3 diploma in gas utilization, and a gas safe registration, such as the accredited certification scheme. To the minimum, a high school diploma or GED is needed.

Gas Technician

ROBERT SMITH

Phone: (123) 456 78 99

Email: info@qwikresume.com

Website: www.qwikresume.com

LinkedIn:

linkedin.com/qwikresume

Address: 1737 Marshville Road,

Alabama.

## Objective

As a Gas Technician, responsible for Establishing and maintaining appropriate inventory of CNG replacement materials and vendor source list for materials. Tracking material usage and cost to help project future budgetary needs.

## Skills

Forklift Operator, Back Hoe Operator, Trencher Operator, Excavator Operator.

## Work Experience

### *Gas Technician*

*ABC Corporation - July 2012 – May 2015*

- Included getting to work early to check all equipment/supplies to make sure everything was ready to be safely operated each day.
- Tasked with spotting main gas lines before digging with a shovel or a piece of equipment.
- Prepared for installation, service, or maintenance of gas-fired appliances Use hand tools, power tools, and a variety of measuring devices to check.
- Installed venting and combustion air systems.
- Installed piping/tubing and components.
- Connected appliances to heat distribution systems.
- Performed shipping and receiving duties Ensured all incoming/out-going products were properly.

### *Gas Technician*

*Delta Corporation - 2011 – 2012*

- Working for the City of Dumas, my general responsibilities consisted of; inspecting multiple gas lines daily throughout the city, maintain.

- Duties were to check for any leaks throughout the residential properties while explaining to residents about hazards and what safety.
- Drove company truck through-out the Tampa Bay area.
- Installed and/or disconnect gas appliances.
- Had to find and fix gas leaks.
- Connected appropriate piping for residential and businesses in order for them to receive gas from suppliers (Teco Energy).
- Received training on proper insulation of above and underground gas tanks.

**Education:** GED

**Task 2:** Write your own resume/CV with the help of the above example and the following layout.

## Layout of a CV/Resume

### CONTACT INFORMATION

Name:

Address:

Telephone:

E-mail:

Photo

### WORKING EXPERIENCE (Vocational training)

Company

Position

Length of Service

... Ltd.

Student

2018-2021

### KEY SKILLS

(Ability to make decisions under pressure

Ability for hard manual work in all weather conditions

Good team player)

### QUALIFICATIONS

Dates

Institutions

2018-2021

... Secondary Technical and Vocational School, Nyíregyháza

2010-2018

... Primary School, Nyíregyháza

### *Special Qualifications*

Dates

Qualification

2021

Driving licence (A, B category)

### REFERENCES

Company

Instructor's Name

Phone

### HOBBIES, INTERESTS

Signature

### III. Letter of Application / Cover Letter / Motivation(al) Letter Tasks

*Task 1: Read the following motivational letter layout of a gas technician and try to understand it. If you need, you can use a dictionary.*

#### Gas Technician Cover Letter Example

Dear Mr Manager,

I am writing to apply for the Gas Technician position advertised on your website.

I am looking for an apprenticeship where I can develop a long term career as a gas technician.

I am a very practical individual with strong problem solving skills and the ability to work under pressure. I work well on my own initiative and am good at making decisions. I work hard, have a high standard of physical fitness and health and take health and safety very seriously.

I am naturally good with numbers and science, am very technical and enjoy challenges so I know that a career as a gas technician is ideal for me.

I am friendly and flexible and comfortable working with a wide range of customers. I have a full driving licence and am able to work antisocial hours if necessary. I am reliable with excellent time keeping skills and will be a committed, enthusiastic team member.

I am available for an interview at your convenience.

Please find attached my CV in response to your advertisement for the above position.

I hope my application will be taken into consideration. I look forward to hearing from you.

Yours sincerely,

Darren Porthouse

*Task 2: Write your letter of application with the help of the above cover letter applying for a gas technician position. Use the following plan:*

**Greeting:** Dear ...

**Opening paragraph:** What job are you applying for? When and where did you see the job advertisement?

**Main part:** What have you studied? What are your qualities related to the job? What kind of work experience have you had? What did you do in your present/previous job? What are some of your interests that could help you get the job? What makes you a suitable applicant?

**Closing paragraph:** Are you enclosing a CV or references? When are you available for an interview? When could you start the job? Hope your application will be taken into consideration.

**Signing off:** signature and printed full name



#### **IV. Small Talks Tasks**

##### ***Task 1: Job Interview***

*Situation: You applied for a central heating fitter position, and now you are talking to the HR Manager. Answer the questions.*

- 1. Tell me about yourself.**
- 2. Tell me about your ability to work under pressure.**
- 3. What field experience do you have for a central heating fitter position?**
- 4. Why do you believe we should hire you?**
- 5. What knowledge do you have about the company?**
- 6. What do you consider to be your best strength?**
- 7. What do you consider to be your biggest weakness?**
- 8. Tell me about a typical day at work.**
- 9. What do you see yourself doing in five years?**
- 10. What are your salary expectations?**
- 11. Do you have any questions?**

**We will notify you in a week by email.**

##### ***Task 2: Problem solving: Act out the dialogue.***

*Situation: Last summer you renovated the central heating system of an old house. Now the customer calls you on the phone that one of the radiators is not heating. Tell him / her what the problem may be.*

*The reasons can be:*

- 1. The radiator is airy.*
- 2. Thermostatic radiator valve is defective.*
- 3. Circulation pump capacity is insufficient.*
- 4. There is clogging at the radiator valve or in the radiator.*

*Solve the problem.*

## V. Occupational Safety Tasks

**Task 1:** Look at the pictures. What do they mean? What signs and what kind of clothes can you see in them?



**Task 2:** Read the text and write at least one piece of safety clothes or equipment onto the dotted line.

PPE is the personal protective equipment that will protect the user against health or safety risks.

What is PPE?

PPE can include items such as safety helmets, gloves, eye protection, hazmat suits, high-visibility clothing, safety footwear, safety harnesses, ear plugs, ear defenders and respiratory protective equipment (RPE). Inappropriate situations disposable PPE may be provided, e.g. single-use coveralls. Employers have duties concerning the provision and use of personal protective equipment at work.

The different types of PPE include:

**Head and scalp protection:** .....

**Respiratory protection:** .....

**Eye protection:** .....

**Hearing protection:** .....

**Hand and arm protection:** .....

**Foot and leg protection:** .....

**Body protection:** .....

**Height and access protection:** .....

**Task 3:** Study and practise safety signs on the website [learningapps.org](https://learningapps.org):

<https://learningapps.org/display?v=p26a8m4un19>

## **VI. Dictionary for Central heating and gasnetworksystem fitters A2**

1. absorber area – elnyelő terület
2. adjust – beállít, igazít, szabályoz
3. angle – szög
4. appliances – készülékek
5. applicant – pályázó
6. apron – kötény
7. assemble – összeszerel
8. bleed valve – légtelenítő szelep
9. bleed wrench – légtelenítő kulcs/fogó
10. boiler – vízmelegítő kazán
11. bracket – konzol
12. chisel – vés, véső
13. circulation pump – keringtető szivattyú
14. clogging - dugulás
15. compactness test – tömörségi vizsgálat
16. copper - réz
17. cover all job requirements – fedí az összes munkaköri követelményt
18. defective - hibás
19. depend on – függ valamitől
20. DHW (Domestic Hot Water) heating – HMV (használati melegvíz) fűtés
21. distributed throughout the interior – elosztva az egész belső téren
22. ditch – árok
23. drill holes – lyukat fúr
24. dripping water – csöpögő víz
25. ear protectors - fülvédő
26. efficient - hatékony
27. electric space heater - elektromos térfűtő

28. employer – munkáltató
29. energy utilisation – energiahasznosítás
30. engineer - mérnök
31. entrant – pályakezdő
32. face shield – fejpajzs, arcpajzs
33. fireplace - kandalló
34. first-aid kit – elsősegély csomag
35. fixture – szerelvény
36. flow – áramlik
37. foot and leg protection – lábfej és lábszárvédő
38. fossil fuels - fosszilis tüzelőanyagok (pl. olaj, szén)
39. furnace - kemence, kazán, kohó
40. futureproof - jövőbiztos
41. gas condensing boiler – kondenzációs gázkazán
42. gas-fired heater - gáztüzelésű fűtőberendezés
43. GED (General Educational Development Test) – általános képzés diploma (középfokú végzettség – érettségihez hasonló)
44. grooved pipe joint – hornyos csökötés
45. hacksaw – fémfűrész
46. hand and arm protection – kéz és karvédő
47. hanger or other support – akasztó vagy más tartószerkezet
48. hard hat/safety helmet – védősisak
49. harmful CO2 emissions – káros CO2 kibocsátás
50. heat pump - hőszivattyú
51. Hi Vis (High Visibility) safety vest – fényvisszaverő biztonsági mellény
52. high alloy stainless steel - magasan ötvözött rozsdamentes acél
53. HVAC (Heating, ventilation and air conditioning) sytem – HVAC (fűtő, szellőztető és légkondicionáló) rendszer
54. I would appreciate your consideration ... - Nagyra értékelném, ha fontolóra venné ...

55. installation – beszerelés, beállítás
56. instructor – oktató
57. insufficient - elégtelen
58. interest-free – kamatmentes
59. is currently committed to – jelenleg elkötelezett
60. lay pipes – csöveket fektet le
61. leaking or broken pipe – szivárgó vagy törött cső
62. maintain – karbantart, kezel
63. make an installation sequence plan – szerelési sorrend tervet készít
64. measure – mér
65. meter – mérőóra, mérőeszköz
66. mount – szerel
67. need less effort – kevesebb erőfeszítésre van szükség
68. passage of pipes – csövek áthaladása
69. pipe / tube / conduit bender – csőhajlító
70. pipe connection technologies – csőkötési technológiák
71. pipe forming - csőalakítás
72. pipe joint – csőkötés
73. pipework – csővezeték
74. PPE, Personal Protective Equipment - védőeszköz, egyéni védőfelszerelés
75. pressure test – nyomáspróba
76. qualification – végzettség, képesítés
77. radiant heating (floor or wall heating) – hő sugárzó fűtés (padló- vagy falfűtés)
78. radiator distribution system - radiátoros elosztórendszer
79. respirator – gázmaszk/ légzőkészülék
80. RPE (Respiratory Protective Equipment) – légzőszervi védőfelszerelés
81. safety boots/shoes – munkavédelmi bakancs/cipő
82. safety fittings – biztonsági szerelvények
83. safety glasses/goggles – védőszemüveg

84. safety gloves – munkavédelmi kesztyű
85. safety rope – biztosító kötél
86. screwdriver – csavarhúzó
87. spread – terjed
88. steel - acél
89. system cleanse of your boiler – a kazánrendszer tisztítása
90. technical drawings of building services – épületgépészeti műszaki tervrajzok
91. thread – menetet vág
92. vacated or abandoned buildings – üres vagy elhagyatott épületek
93. valve – szelep
94. vocational certificate – szakmai bizonyítvány
95. vocational training – szakmai gyakorlat
96. welding helmet – hegesztő pajzs
97. welding torch - hegesztőpisztoly
98. wide brimmed hat - széles karimájú kalap
99. wood-burning and pellet stoves - faégető és pellet kályhák
100. you can count on me – számíthatsz rám

## VII. Applied Sources

### I. Source of Reading Comprehension Tasks

<https://www.imsheatpumps.co.uk/blog/alternative-heating-systems-your-quick-guide/>

<https://ygrene.com/blog/property-improvements/5-alternative-heating-sources-your-home>

<https://www.viessmann.co.uk/residential/heating-systems-for-new-build/gas-condensing-technology-plus-solar-thermal>

8th August 2021

### II. Source of CV Tasks

<https://www.qwikresume.com/resume-samples/gas-technician/>

9th August 2021

### III. Source of Letter of Application / Cover Letter / Motivation(al) Letter Tasks

<https://www.icover.org.uk/gas-technician-cover-letter-example/>

9th August 2021

### V. Sources of Occupational Safety Tasks:

<https://www.dreamstime.com/required-personal-protective-equipment-ppe-symbol-safety-icon-image181833845>

<https://rjloc.com/knowing-your-workwear-ppe/>

<https://www.shponline.co.uk/ppe-personal-protective-equipment/>

<https://www.sealtec.ie/satexo-oxford-yellow-hi-vis-wetsuit>

<https://learningapps.org/display?v=p26a8m4un19>

10th August 2021