

Managing malaria

Student guidance notes



Group instructions

Your group has been given the role of malaria programme managers for a malaria endemic region. As a group you must assess the situations facing the communities in this region and propose a strategy that will work towards eliminating malaria from the area. Each group has a scenario sheet for your allocated region. Read this carefully and identify the major points that will aid you in forming your strategy. Once you have come up with a malaria elimination strategy you must present your proposal to the rest of the class summarising your reasons for suggesting this strategy.

Before you start

Before starting the discussion your group should nominate the following roles:

- **Spokesperson(s):** the person or persons who will speak on behalf of the group during the feedback session.
- **Scribe:** the person responsible for taking notes on all of the discussion and completing the group worksheet.

Information gathering

On the second page of your scenario is a list of malaria prevention methods available to your group. Each member of your team needs to research at least one of these methods. Allocate one or two methods per person, for example, one person research bed nets and another travelling healthcare clinics. Use the *Malaria Challenge* resource to gather information on these areas.

Forming your strategy

Your strategy should identify who is most at risk, the challenges facing the communities, and propose three initiatives that will work towards controlling and eliminating malaria in the region. You must also consider how you would communicate your strategy and monitor whether your initiatives are having an impact.

As a group complete your worksheet with the details of your strategy and present your ideas to the rest of the class.

Discussion points for consideration

When discussing your scenario, consider the following points to help you make your decisions on the best malaria control strategies for your target region.

- 1. Are there specific sections of the population that should be targeted more than others?**
For example, are there certain people in your target area who are more likely to get bitten by mosquitoes, e.g. field workers. Are there certain people in the community who are more likely to suffer from severe malaria or develop medical complications such as young children and pregnant women?
- 2. What is the mix of *Plasmodium* species in this area and will this affect the type of drugs prescribed?**
It is important to remember that the species of *Plasmodium* will determine the types of treatments

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patients are given. For example, *Plasmodium vivax* can be treated with primaquine to kill dormant sporozoites in the liver. However, this treatment is not suitable against *Plasmodium falciparum* because this species does not form dormant parasites that remain in the liver. Chloroquine resistant *Plasmodium falciparum* cannot be treated with chloroquine so alternative drugs need to be used.

3. What are the most appropriate interventions for this region?

Remember that some interventions are not suitable for all situations. For example, indoor residual spraying is not appropriate if the mosquito vector lives in trees and usually bites people outside of their houses.

4. How will issues such as access and poverty impact on your strategy?

Poverty is a major problem in all of these regions. Will people have to pay for the interventions? Will they be subsidised or will they be freely distributed? Many of the scenarios feature remote communities, how can you ensure that people within these communities are reached?

5. How will you know if your strategy is having an impact?

Evaluation and monitoring is important to determine whether your malaria control programme is working. What do you think are the best ways of monitoring malaria cases in the community? For example, do you use rapid diagnostic tests with anyone showing symptoms of malaria such as a high fever? How are test results and patient diagnoses recorded? Who is responsible for recording them? Is there a way of monitoring whether the communities are adopting and using the interventions correctly?

6. How will your group communicate the malaria control strategy to the target communities?

For a malaria programme to be successful, you need to gain the acceptance and understanding of the communities the programme is targeting. What do you think is the best way to communicate the importance of malaria prevention to these communities? Bear in mind some rural communities only have oral languages and may not be able to read and write. Communication strategies need to overcome these challenges.

Also consider whether or not to involve the community in the programme? For example, could members of the community be trained to continue the programme and train others once the programme is up and running?

How to set out a malaria elimination initiative?

1. Give the initiative a title.

Rural health outreach programme

2. Outline what problem the initiative is addressing?

One of the major issues in this region is the distance to healthcare facilities. Cases can be reduced and fatalities avoided if the rural communities in this area can have regular access to healthcare practitioners and malaria treatments.

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3. Outline the aims of the initiative, making reference to the prevention methods you will be using.

This initiative will aim to:

- Introduce travelling clinics to ensure that remote communities have regular contact with health practitioners.
- Offer antenatal services as part of the travelling clinics to monitor pregnancies and to supply pregnant women with intermittent malaria treatments to treat and prevent malaria infections.
- Train community members as village malaria workers who are able to diagnose and treat cases of malaria.
- Where appropriate use drugs such as artemisinin combination therapies which will be most effective against drug resistant strains of *Plasmodium falciparum*. These drugs will be sourced and purchased by the team.

Notice that this initiative has incorporated two related prevention methods – anti-malarial drugs and travelling clinics.