

**Paper Reference 4GE1/02**  
**Pearson Edexcel**  
**International GCSE (9–1)**

# **Geography**

## **PAPER 2: Human geography**

**Time: 1 hour 45 minutes**

# **Resource Booklet**

**Do not return this Resource Booklet with the Question Paper.**

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For some Figures there is a modified colour and modified black and white diagram. You may use whichever version is easier for you to view. Some diagrams are only in modified colour but you are then provided with a description of the diagram.

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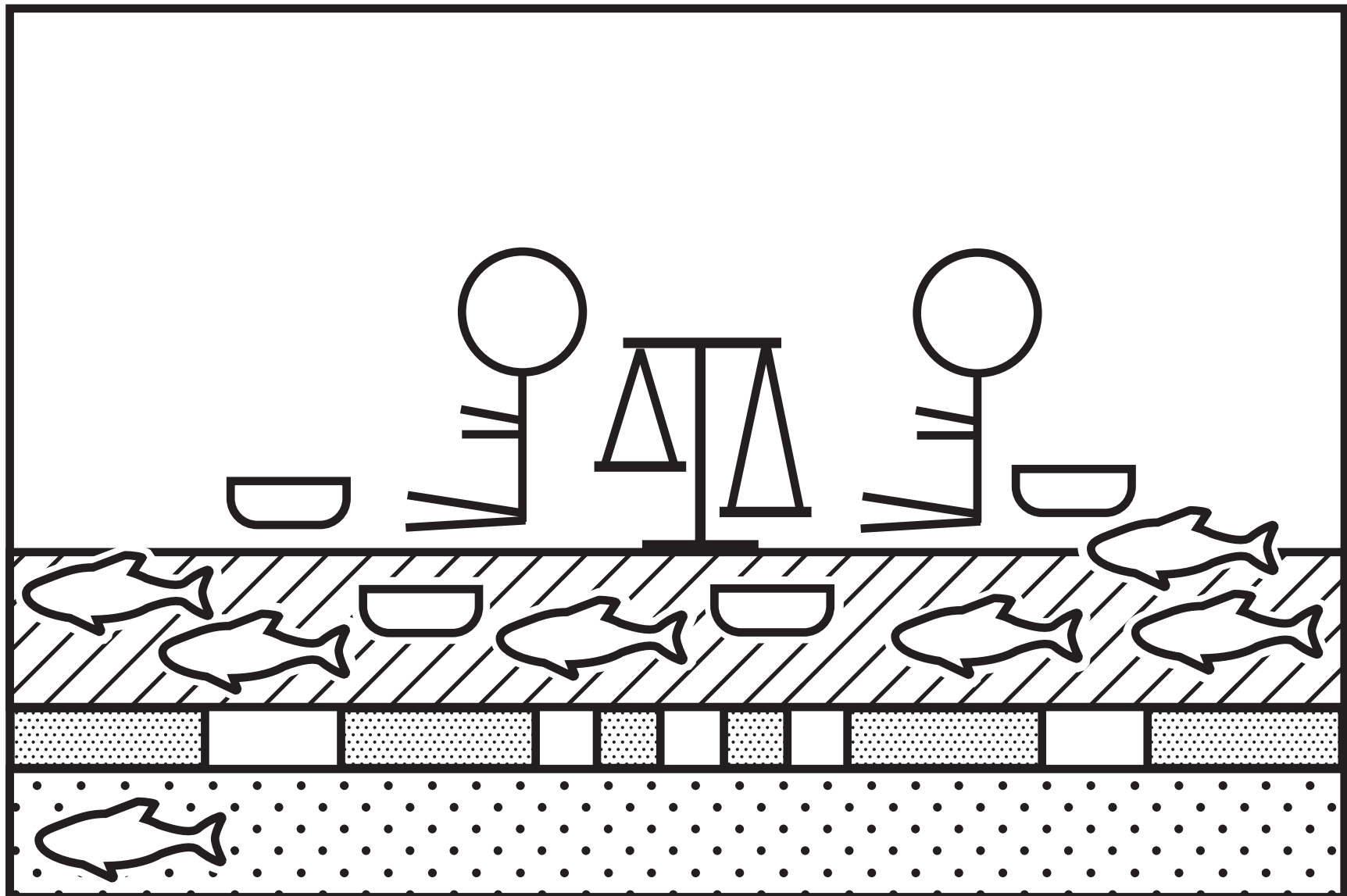
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Figure 1a  
Informal employment in Kolkata, India



KEY



Figure 1b

# Malthus' theory of population growth and food supply over time

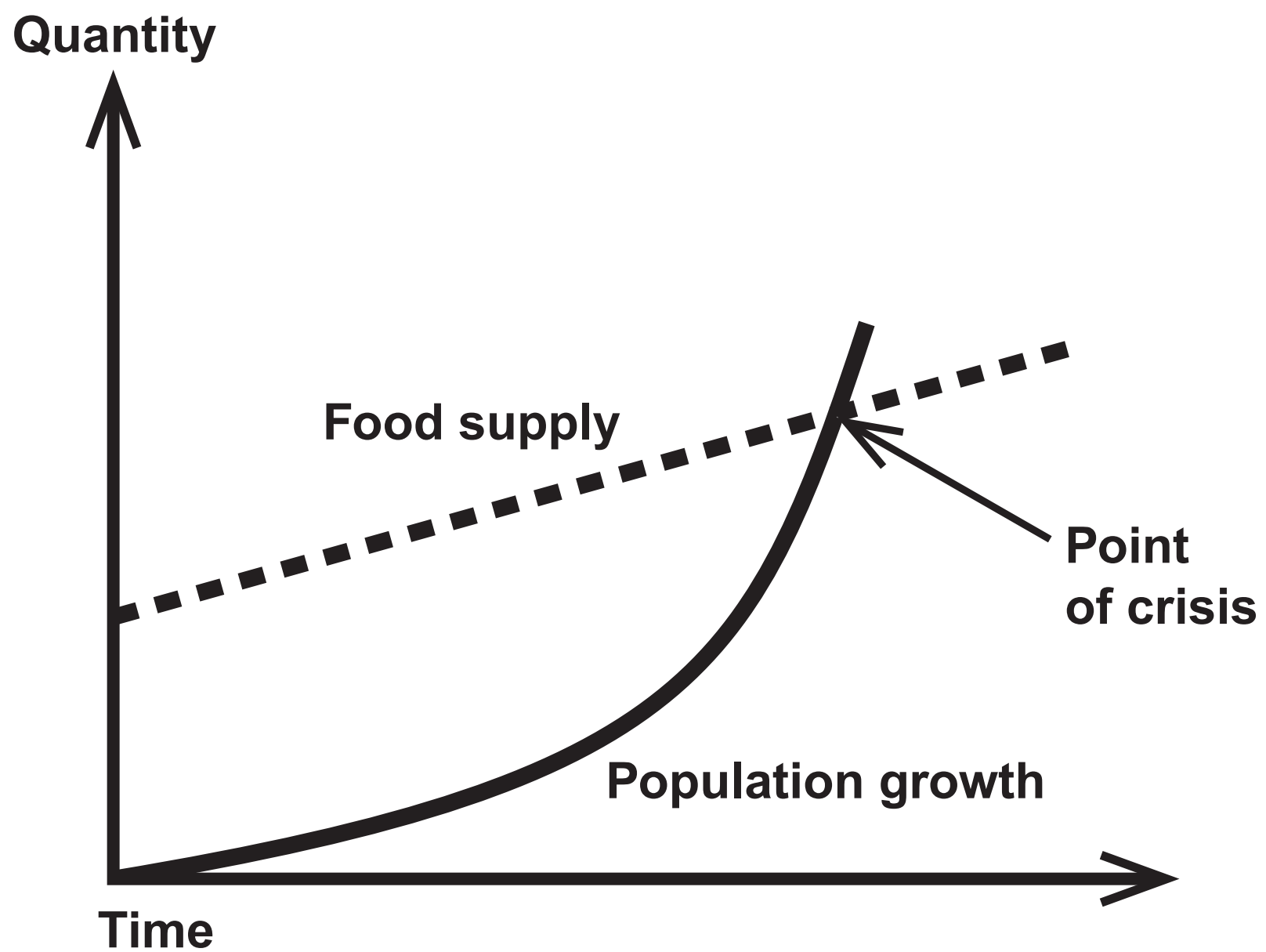


Figure 1c

Percentage (%) of people employed in the secondary sector in selected countries, 1991–2019

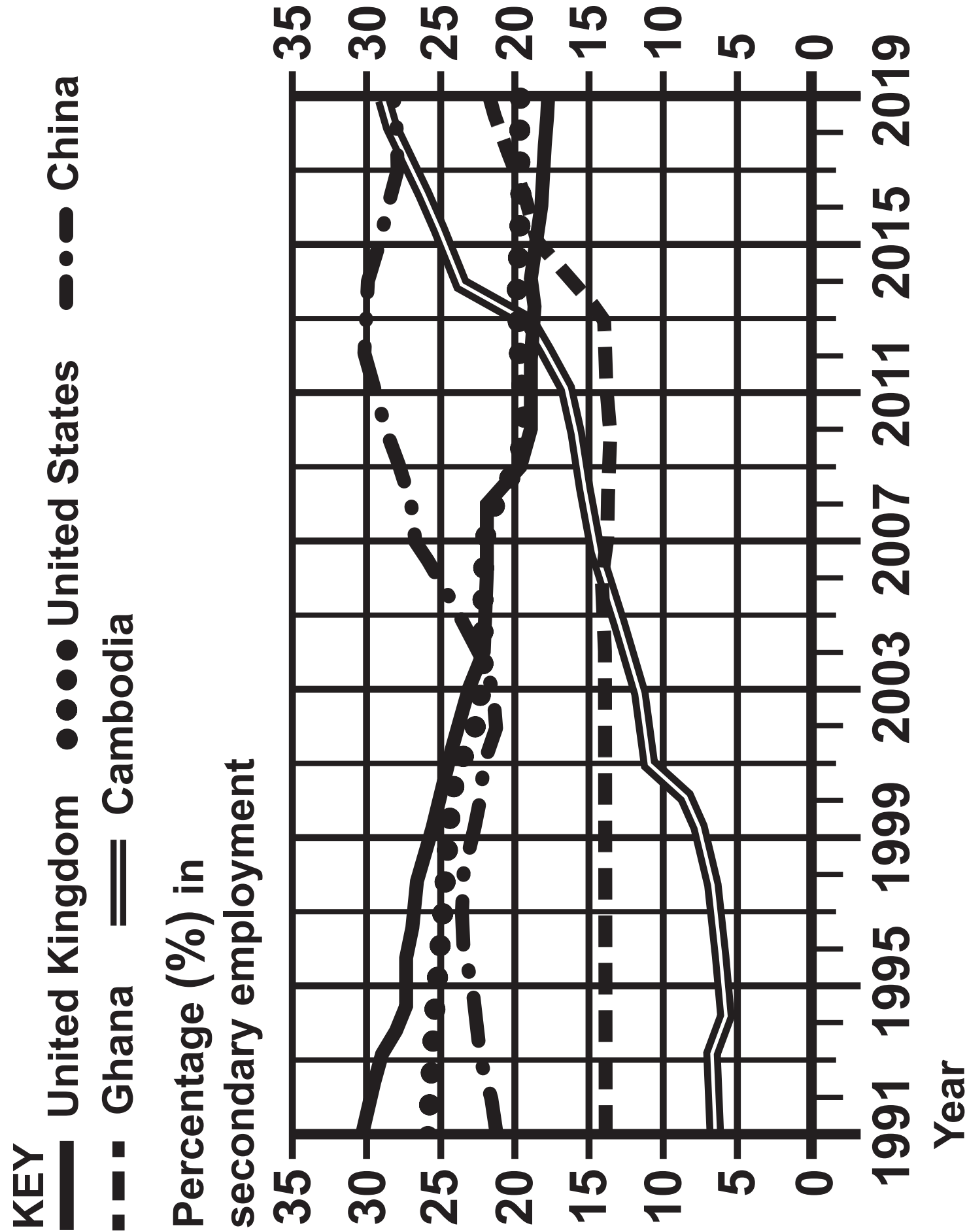
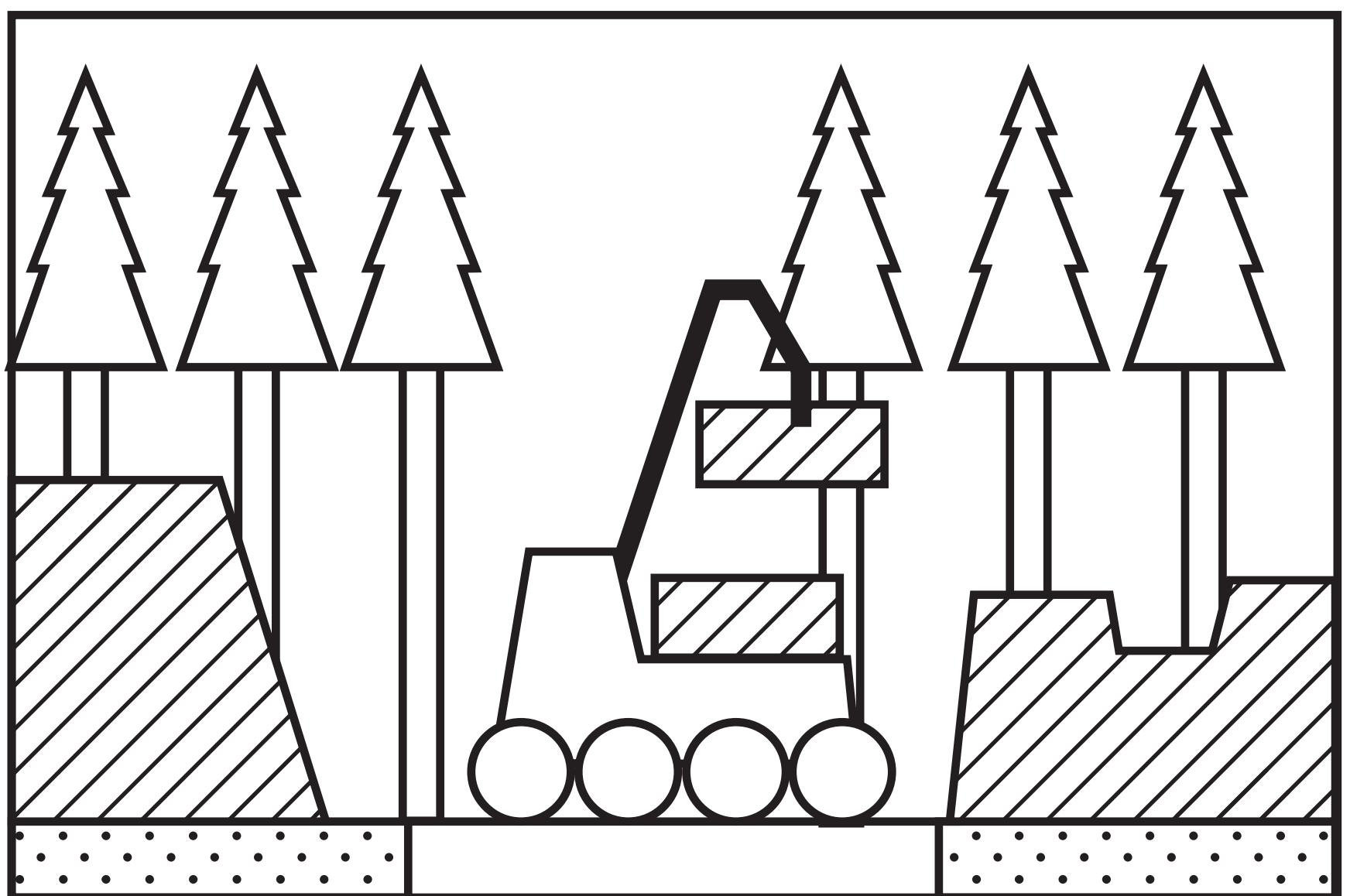




Figure 2a

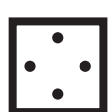
# A temperate forest in the United States of America



## KEY



Log piles



Grass



Trees

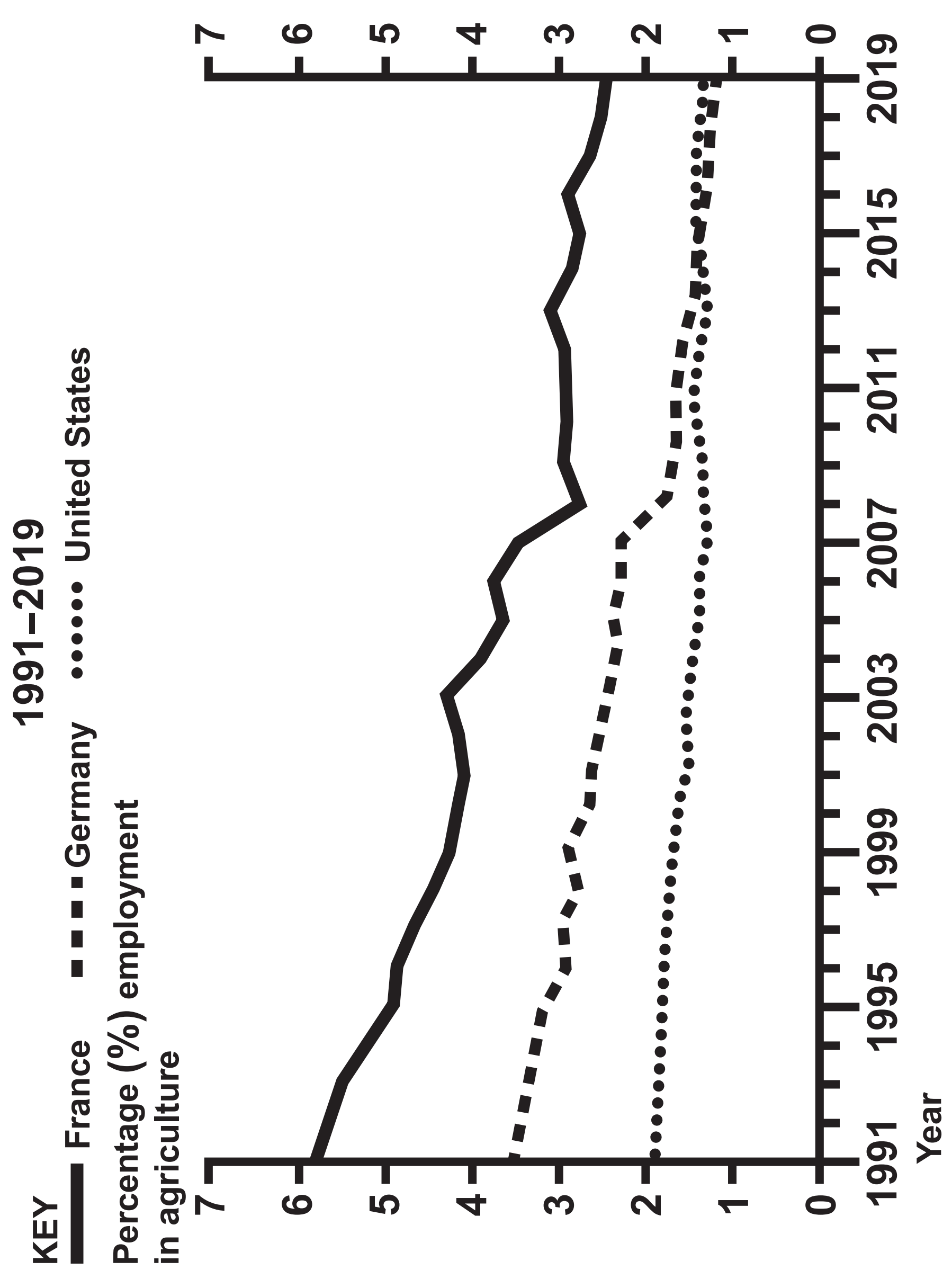


Machinery



Figure 2b

Percentage (%) of employment in agriculture for selected countries,



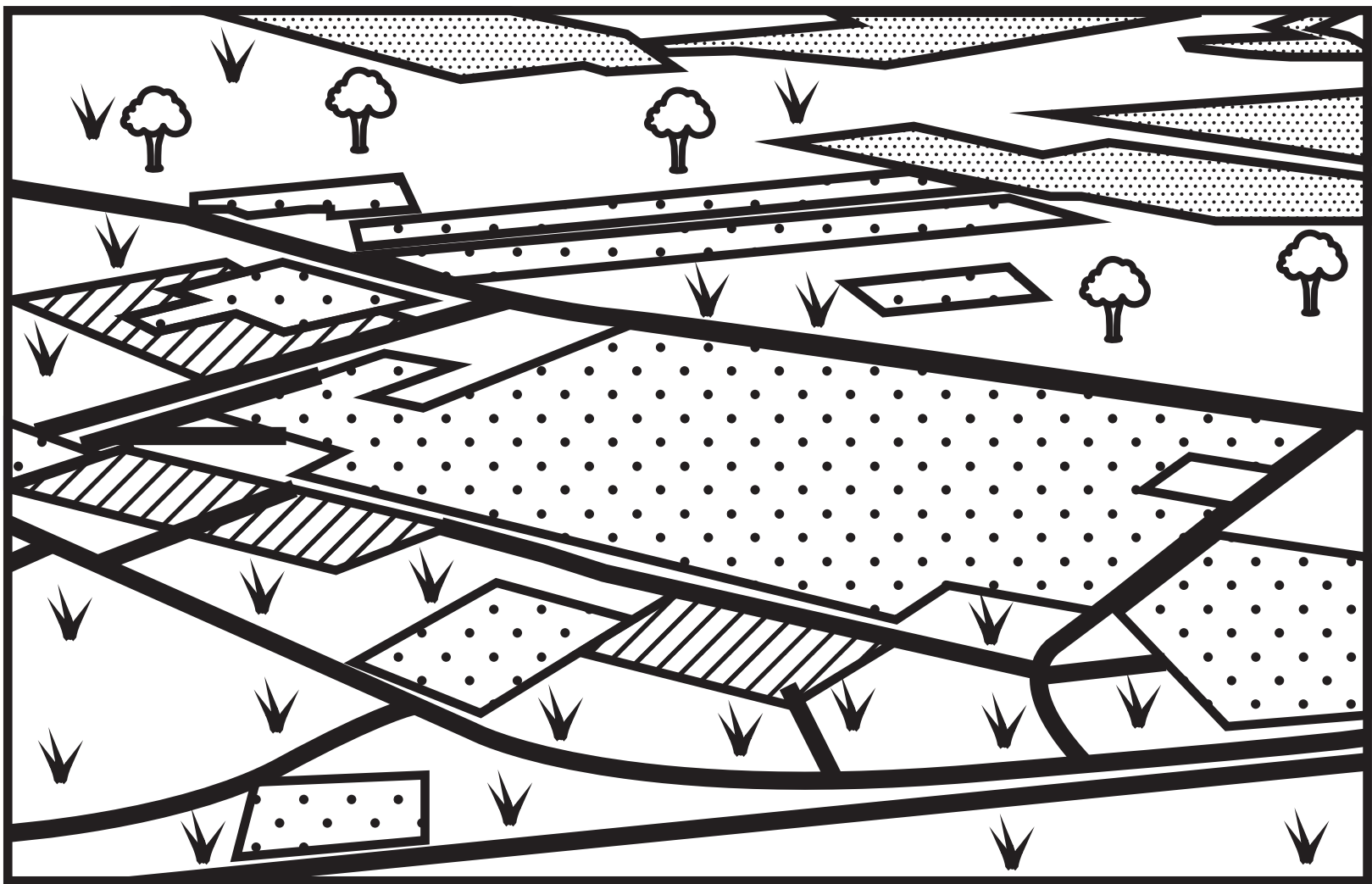
## Figure 2c

### Views from a farmer in Uganda

- I have recently got a smartphone so I can check local market crop prices.
- There's so much work to do and many of the younger people have left to work in the city.
- Droughts are becoming worse in some areas, making it more difficult to produce enough.

Figure 3a

Aerial photo of a factory in New Orleans,  
United States of America



KEY

- |   |  |  |
|---|--|--|
|  Factory buildings |  Car parks |  Roads      |
|  Residential areas |  Trees     |  Vegetation |

Figure 3b

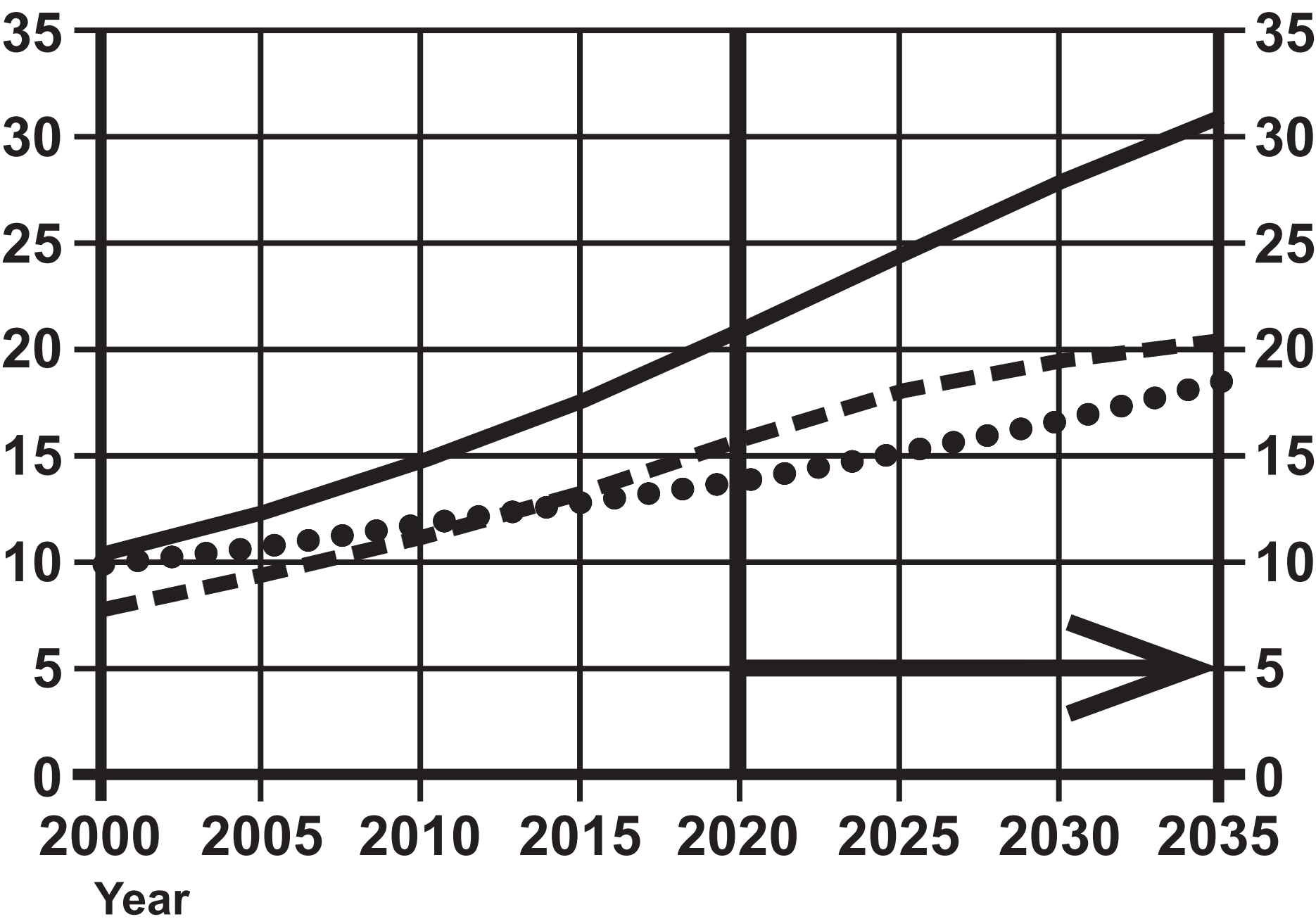
Population and predicted population of selected megacities, 2000–2035

KEY

**—** Dhaka    **- - -** Chongqing    **●●●●** Manila

**➤** Predicted population

Population (millions)





## Figure 3c

### **Comments from a planner in London, United Kingdom**

- **We want to introduce a new scheme to limit the number of vehicles visiting the city centre.**
- **There's a new recycling facility to try and reduce the amount of waste going to landfill.**
- **We want to find ways of using more renewable energy to reduce CO<sub>2</sub> emissions.**

**Figure 4a****An extract from a student's questionnaire****Questionnaire: Investigating energy efficiency in the home**

**1. Do you think your home is energy efficient?**

Yes ☐

No ☐

**2. Do you want to make your home more energy efficient?**

Yes ☐

No ☐

**3. Why?**

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**4. How do you think you could make your home more energy efficient?**

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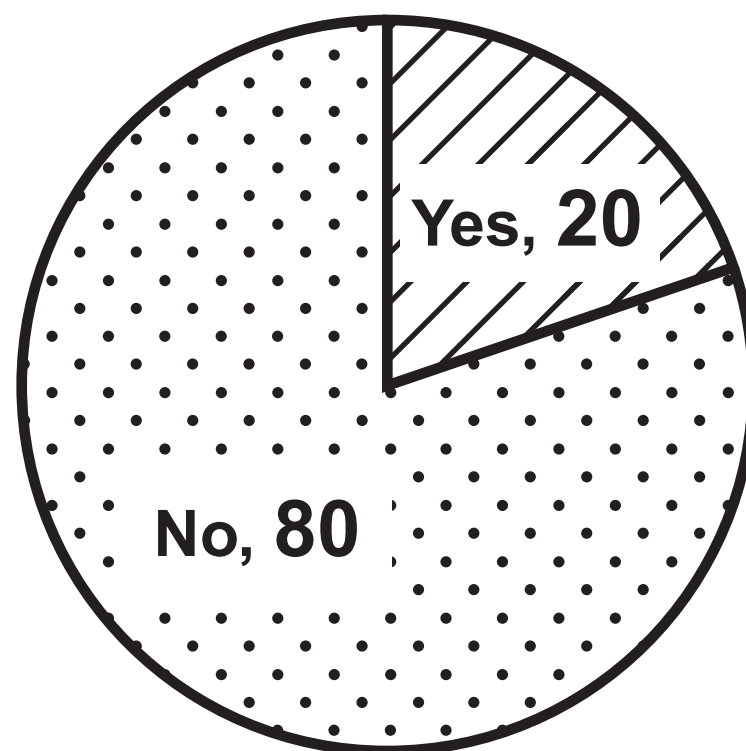
Figure 4a continued.

5. On a scale of 1–5 how likely are you to make the following changes to your home:

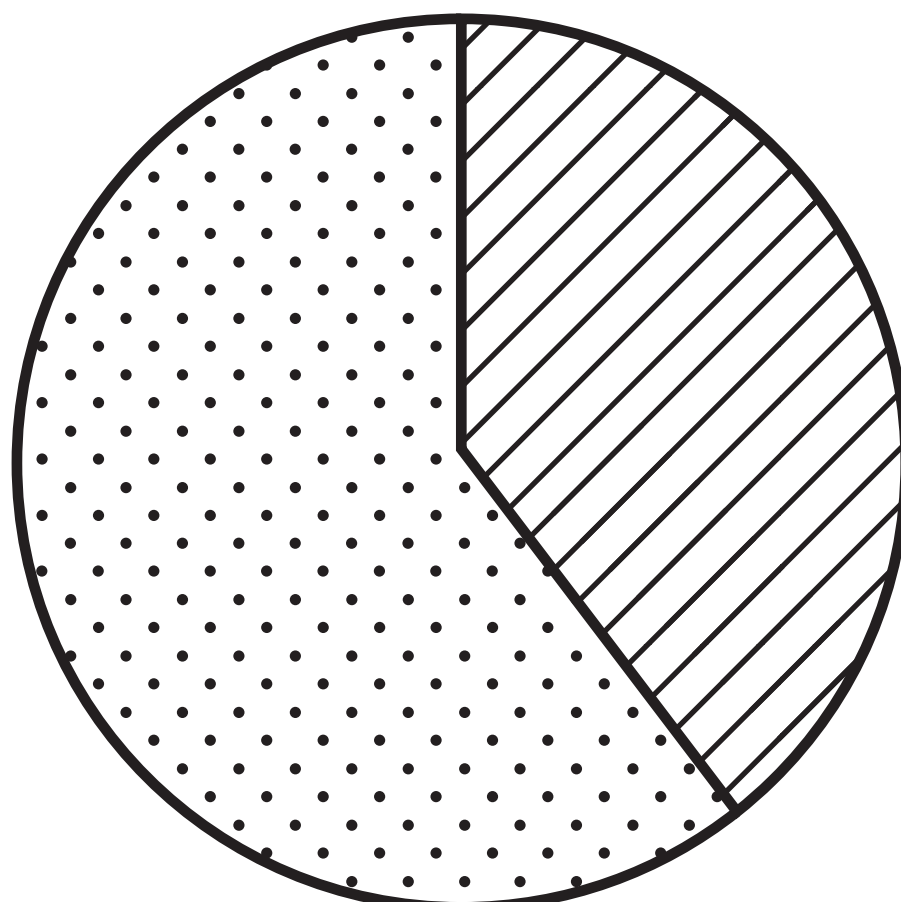
	1	2	3	4	5
Solar panels	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
New windows (with double glazing)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Roof insulation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Underfloor heating	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

**Figure 4b****An extract from a student's data presentation**

**Question 1. Do you think your home is energy efficient?**



**Question 2. Do you want to make your home more energy efficient?**



**An extract from a student's questionnaire**  
**Questionnaire: Investigating the impact of tourists**  
**in the Lake District National Park**

**1. Do you think tourists have a negative impact on the national park?**

**Yes** ☐

**No** ☐

**2. Do you think there should be limits on the number of tourists?**

**Yes** ☐

**No** ☐

**3. Why?**

---

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**4. How do you think tourists could reduce their impact on the national park?**

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Figure 5a continued.

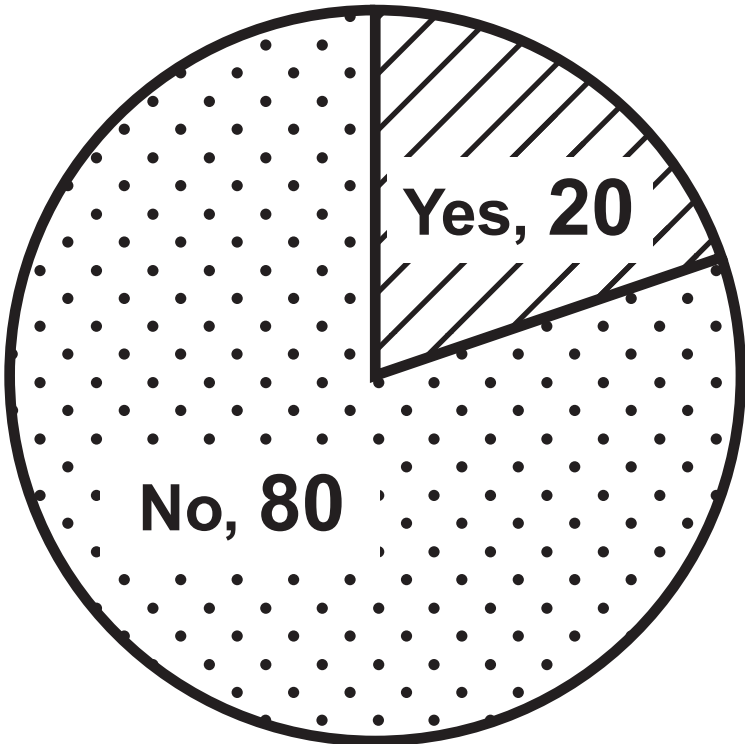
5. On a scale of 1–5 how much do tourists affect these features of the national park:

	1	2	3	4	5
Traffic	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Property prices	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Scenic beauty	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Pollution	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

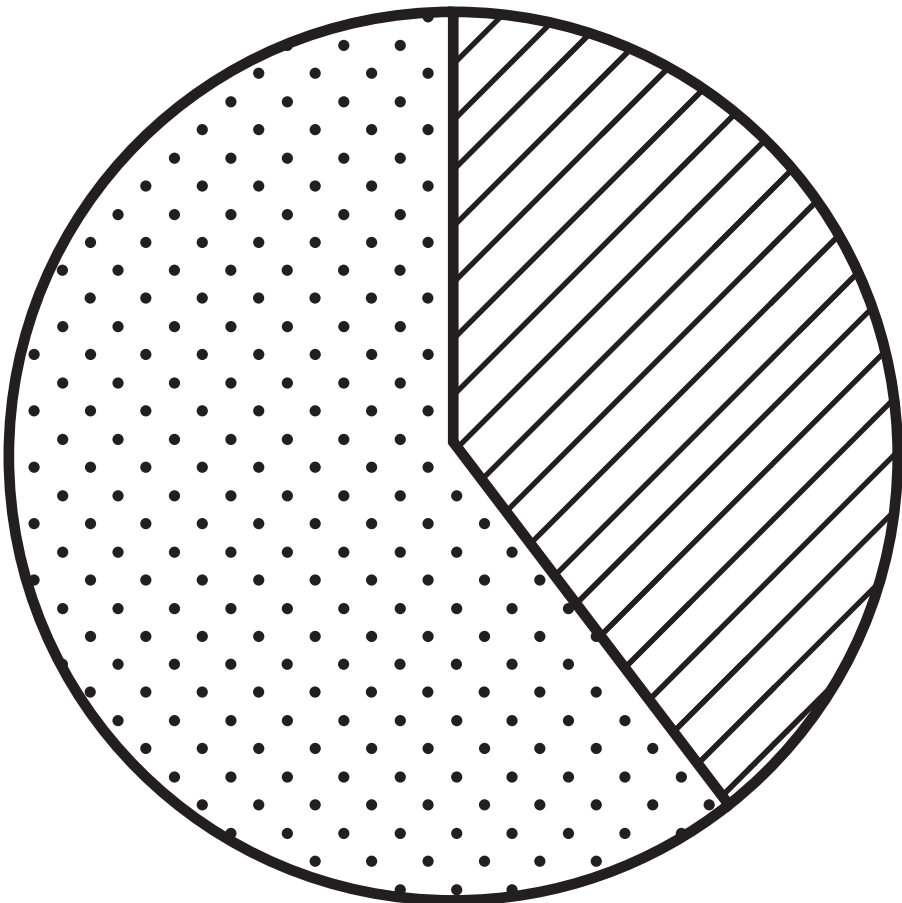
Figure 5b

An extract from a student’s data presentation

Question 1. Do you think tourists have a negative impact on the national park?



Question 2. Do you think there should be limits to the number of tourists?



**An extract from a student's questionnaire**

**Questionnaire: Investigating factory  
redevelopment**

**1. Do you think the factory needs to be redeveloped?**

Yes ☐

No ☐

**2. Does this area need more space for businesses and a  
hotel?**

Yes ☐

No ☐

**3. Why?**

---

---

---

**4. How do you think the factory could be redeveloped to be  
useful to the local area?**

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Figure 6a continued.

5. On a scale of 1–5 how likely are you to use the future businesses planned for this

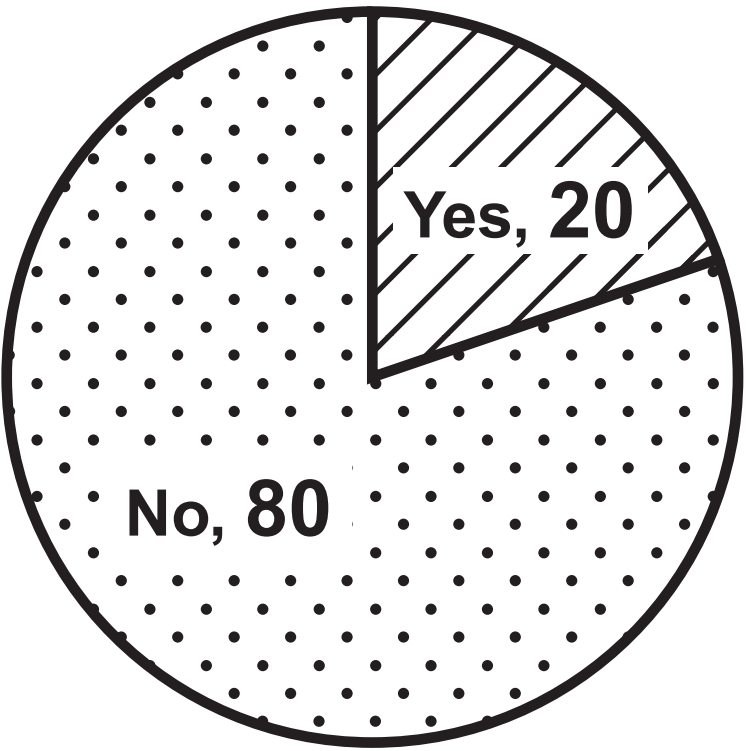
factory:

	1	2	3	4	5
Office space	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Gym	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Coffee shop	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hotel	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Figure 6b

An extract from a student’s data presentation

Question 1. Do you think the factory needs to be redeveloped?



Question 2. Do you think this area needs more space for business and a hotel?

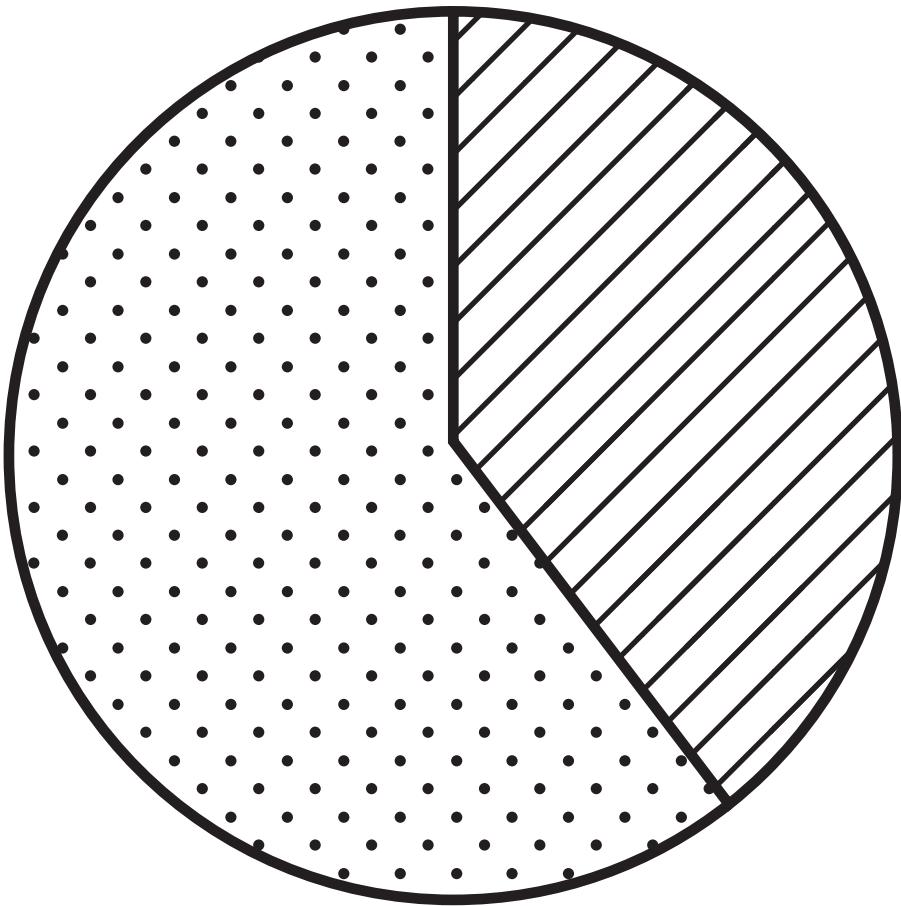


Figure 7a – Colour (Part 1)  
Levels of global desertification risk

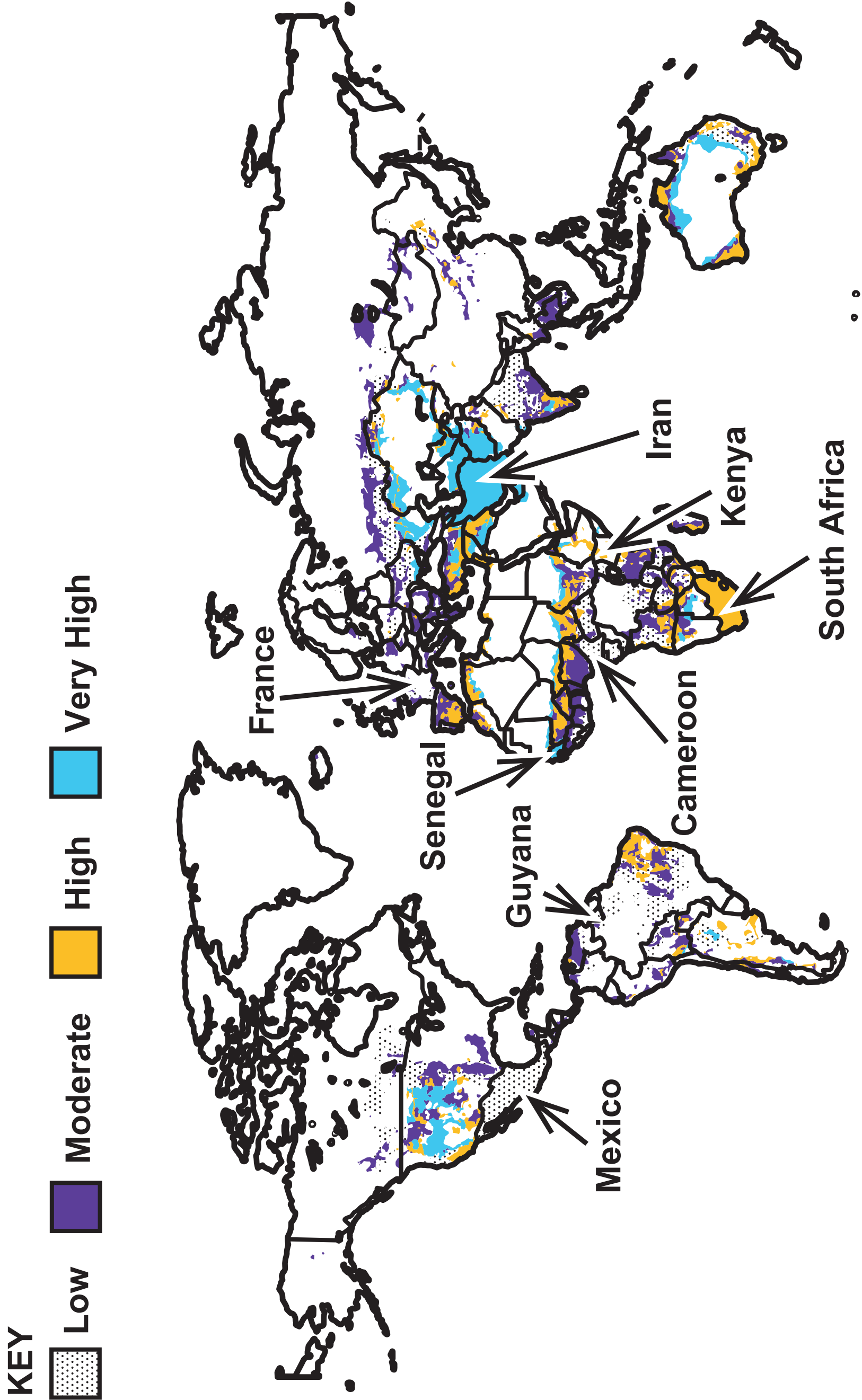


Figure 7a – Colour (Part 2)

Levels of global desertification risk

KEY

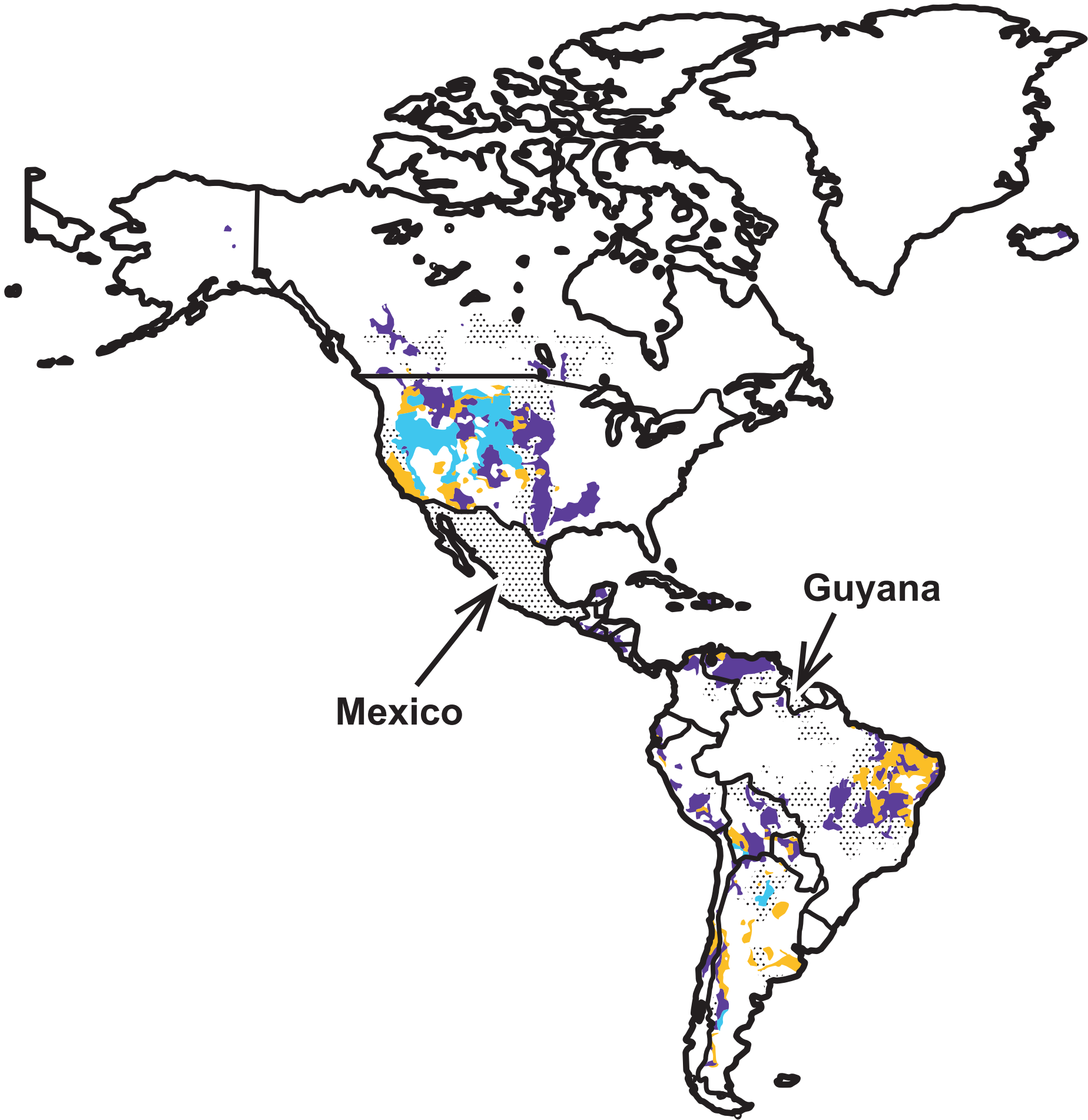
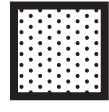


Figure 7a – Colour (Part 3)

Levels of global desertification risk

KEY



Low



Moderate



High



Very High

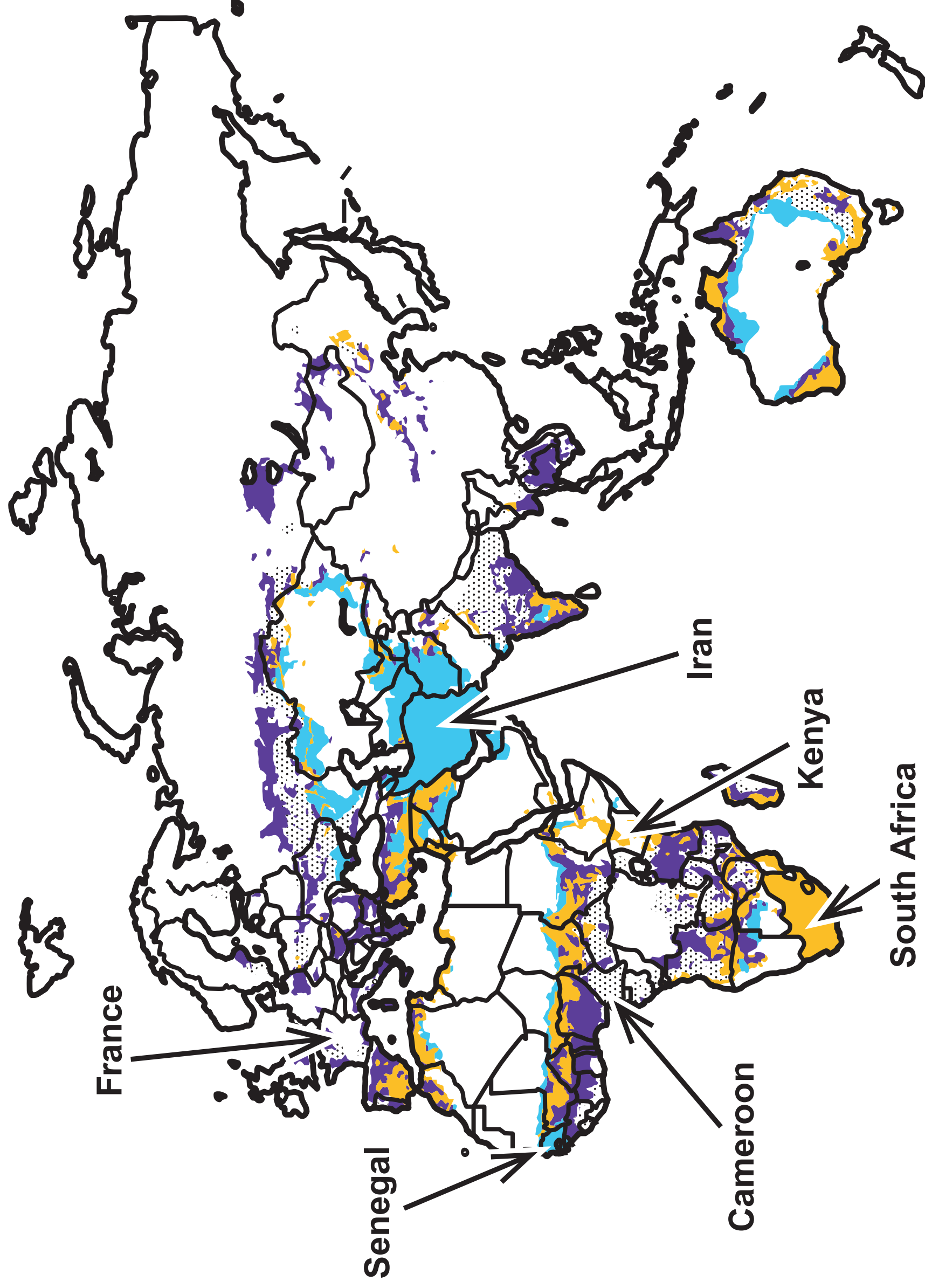


Figure 7a – Black and White (Part 1)  
Levels of global desertification risk

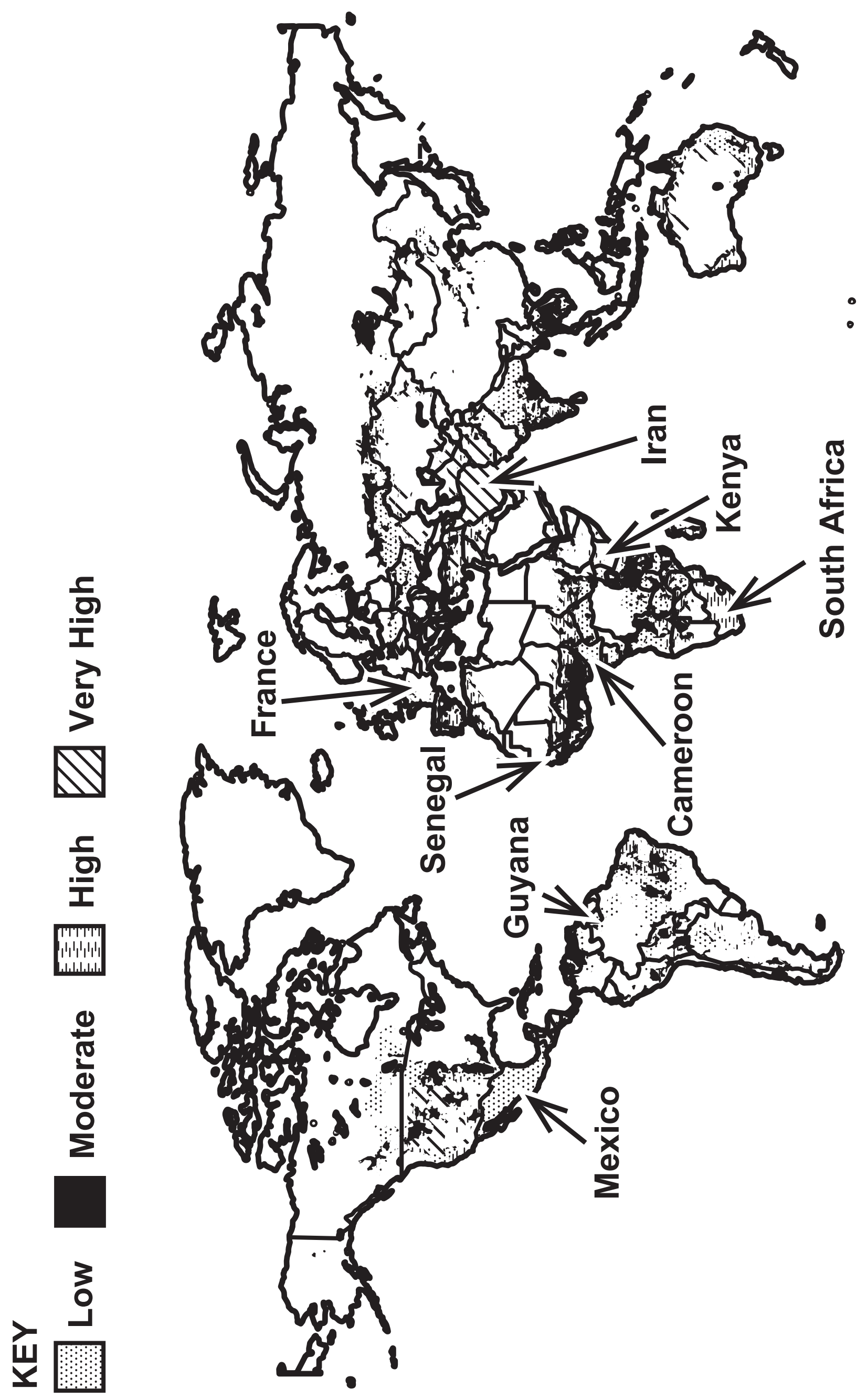




Figure 7a – Black and White (Part 2)  
Levels of global desertification risk

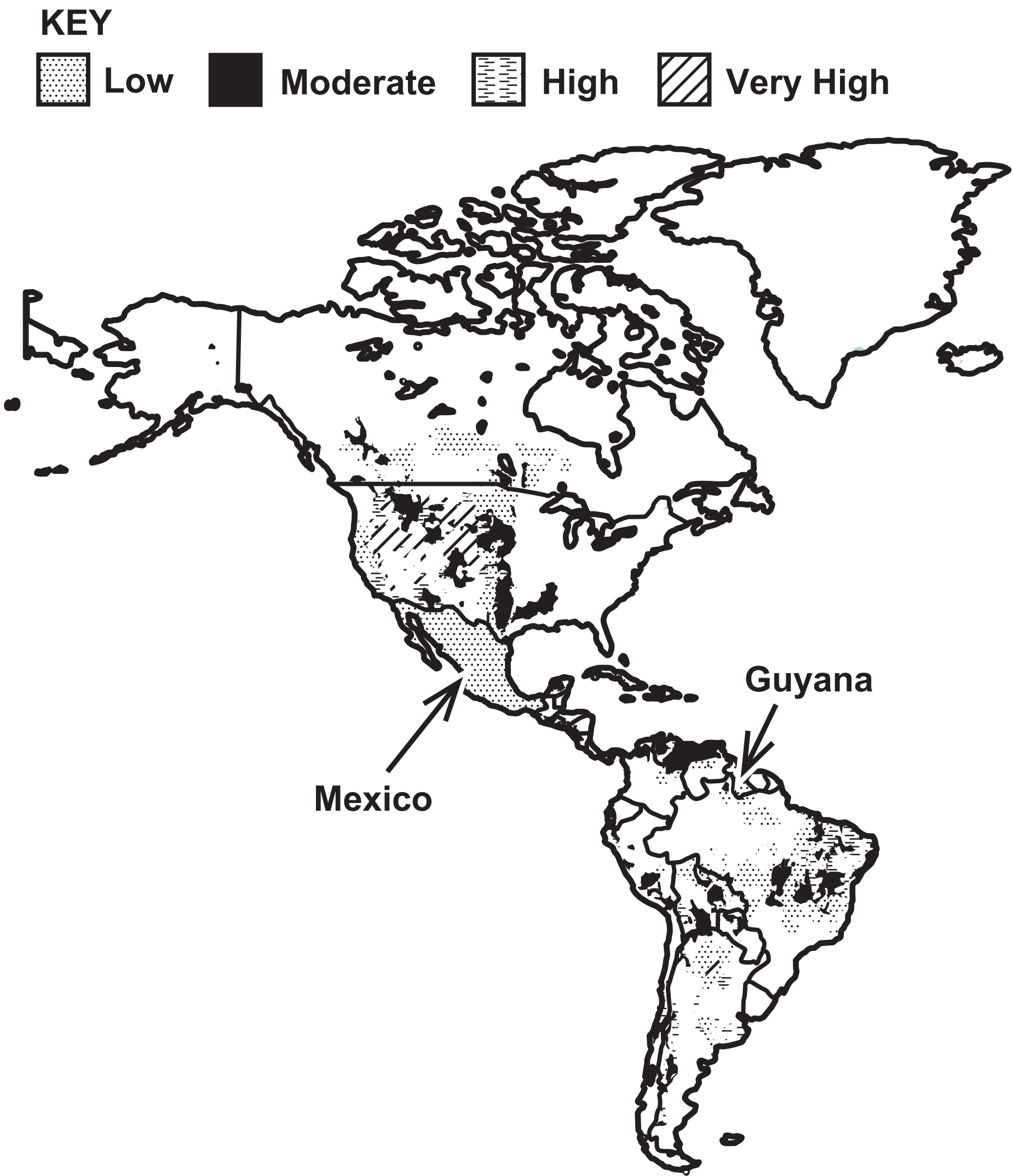


Figure 7a – Black and White (Part 3)

Levels of global desertification risk

KEY



Low



Moderate



High



Very High

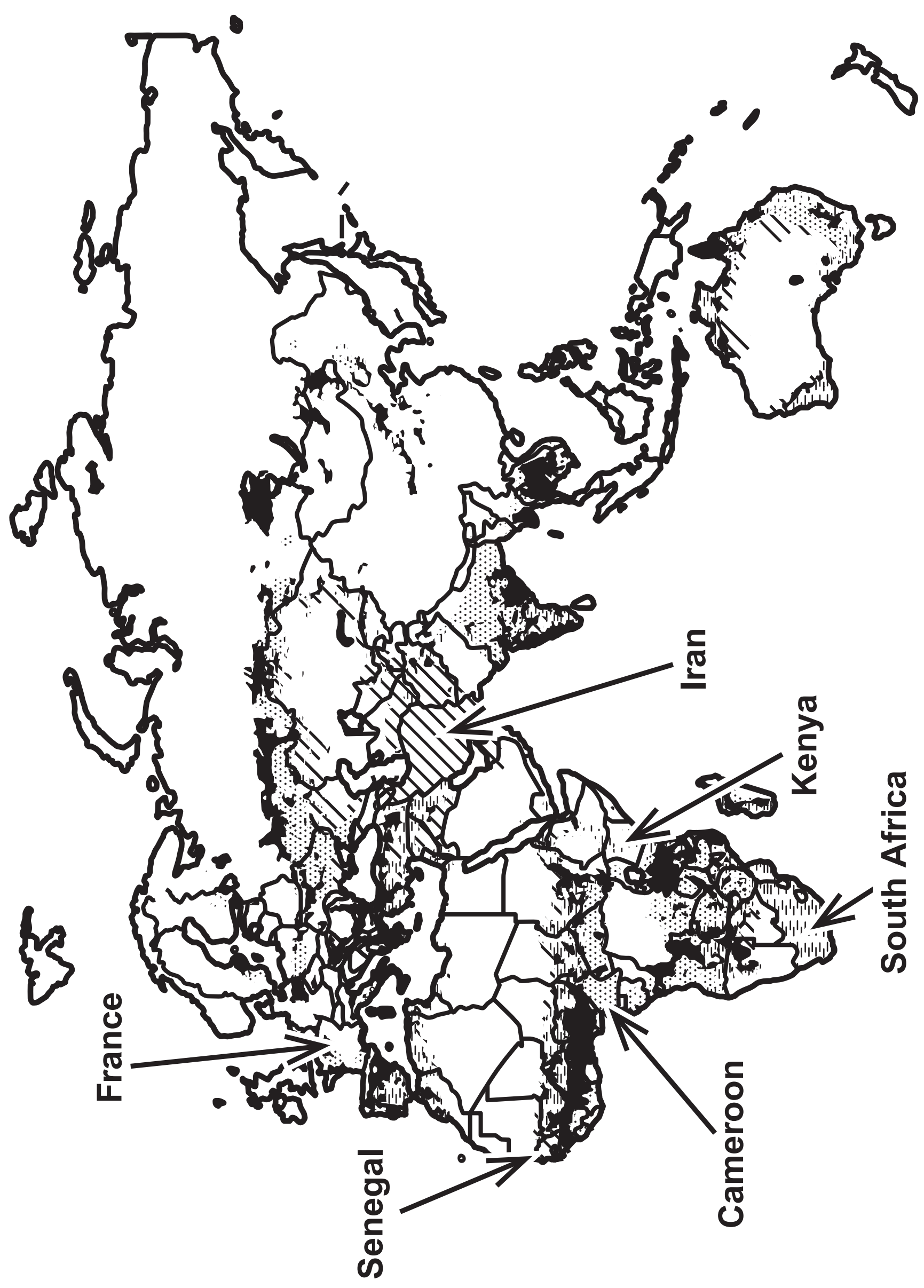




Figure 7b

Number of tropical storms affecting selected regions, 2010–2019

KEY

2010

2019

A = Atlantic

EP = Eastern Pacific

WP = Western Pacific

SW = South–west Indian

AU = Australia

SP = South Pacific

Number of tropical storms

Region	2010	2019
A	8	20
EP	12	20
WP	30	50
SW	10	10
AU	14	14
SP	10	16

Region

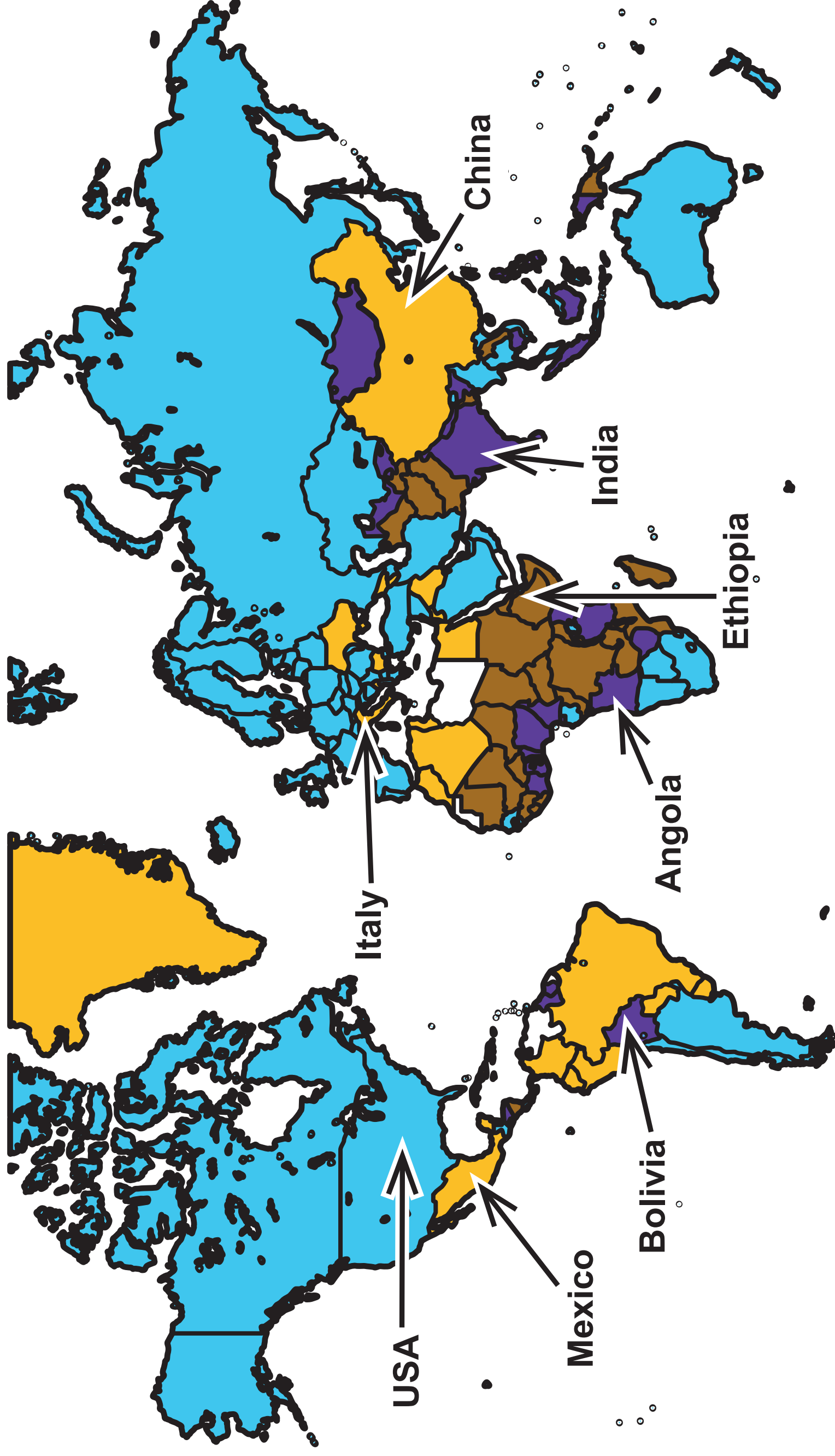
Figure 7c

Selected impacts of deforestation

Physical	Human
Loss of biodiversity	Loss of goods provided by the forest
Soil erosion	Local communities forced to move
Increased CO <sub>2</sub> in the atmosphere	Money made from deforestation can support economic development

# Percentage of the population not using the internet (2019)

KEY: Percentage (%) of population not using the internet



# Percentage of the population not using the internet (2019)

KEY: Percentage (%) of population not using the internet

0–25    26–50    51–75    76–100

□ Data not available



Percentage of the population not using the internet (2019)

KEY: Percentage (%) of  
population not using the internet

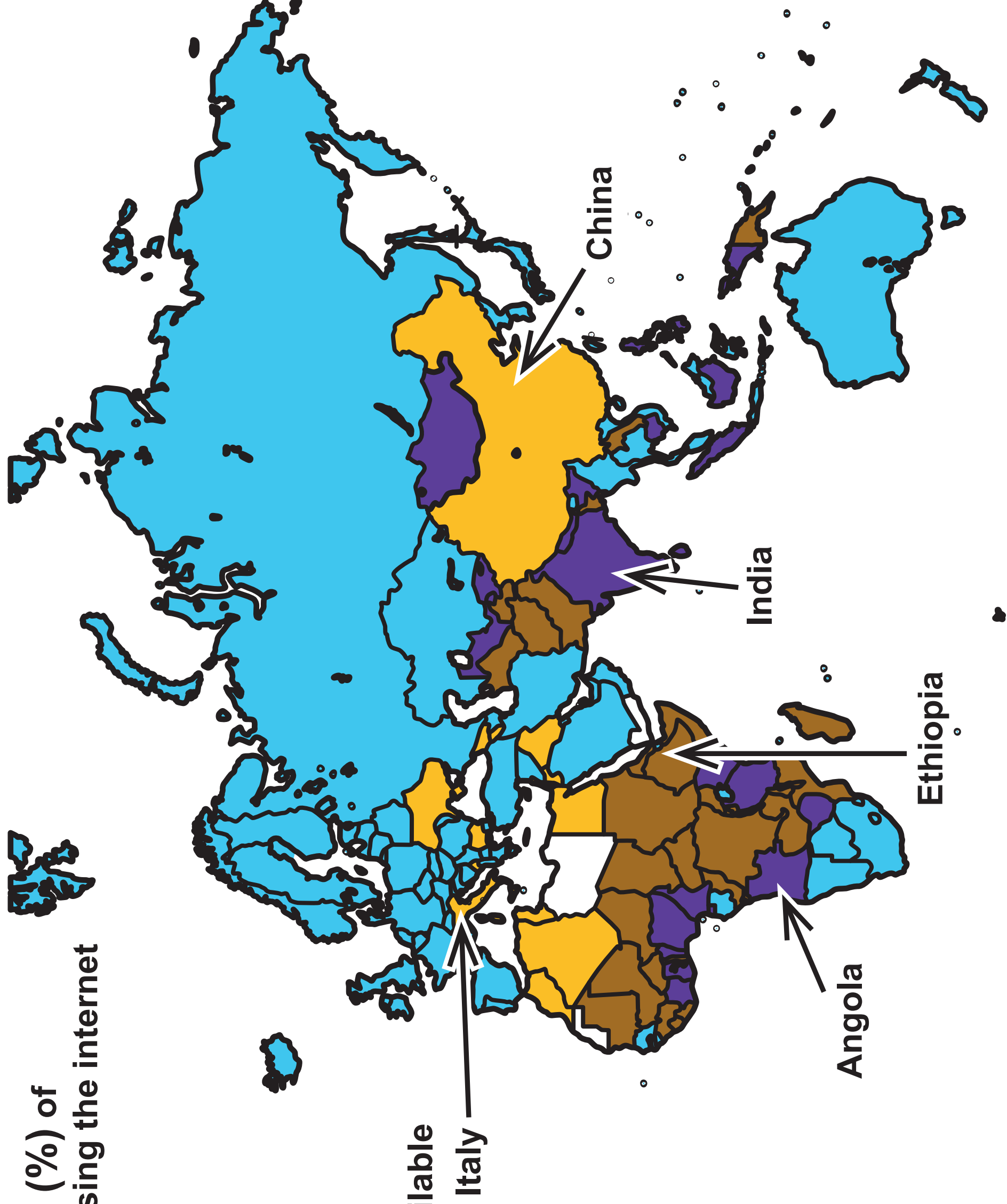
0–25

26–50

51–75

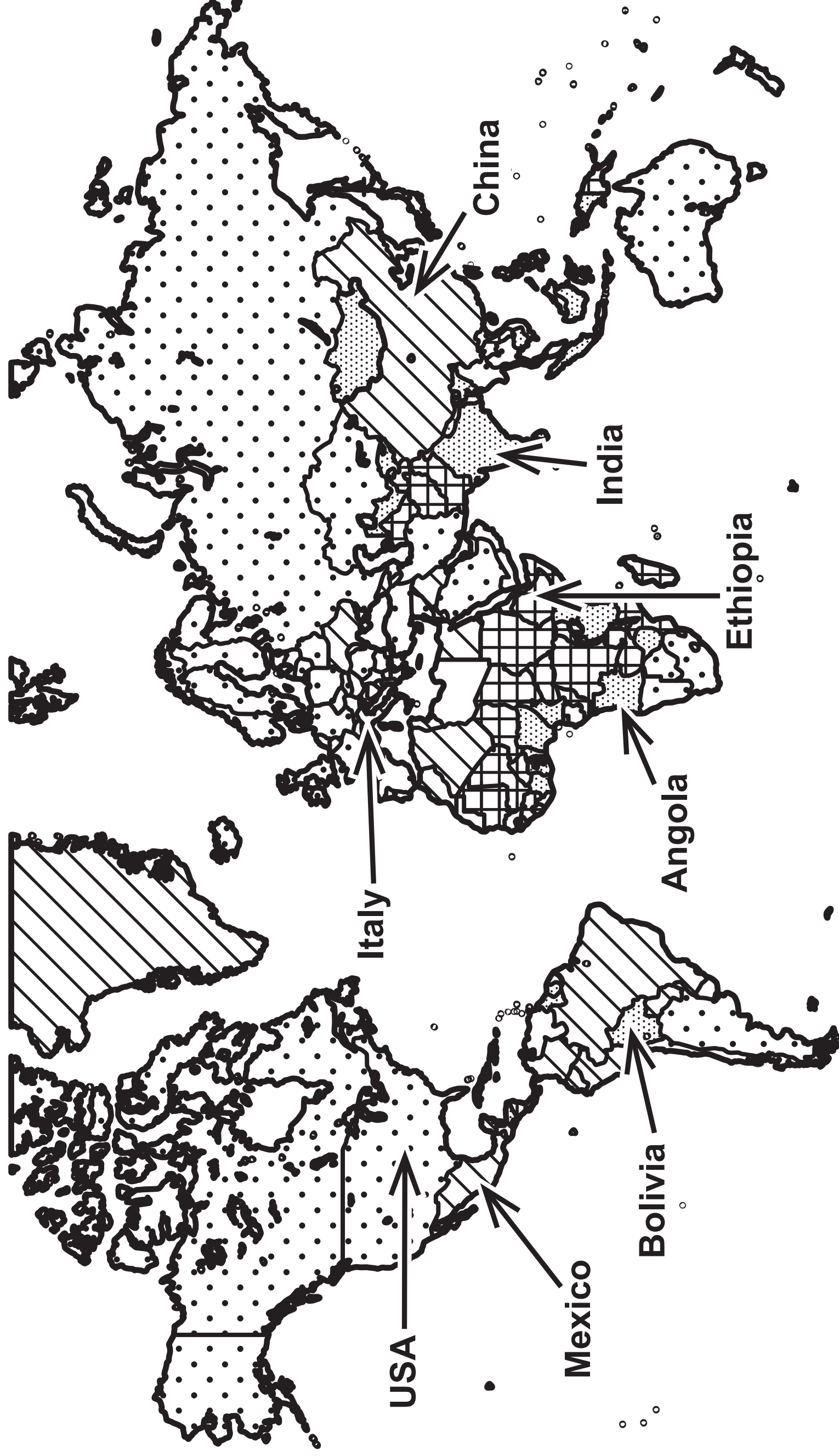
76–100

Data not available

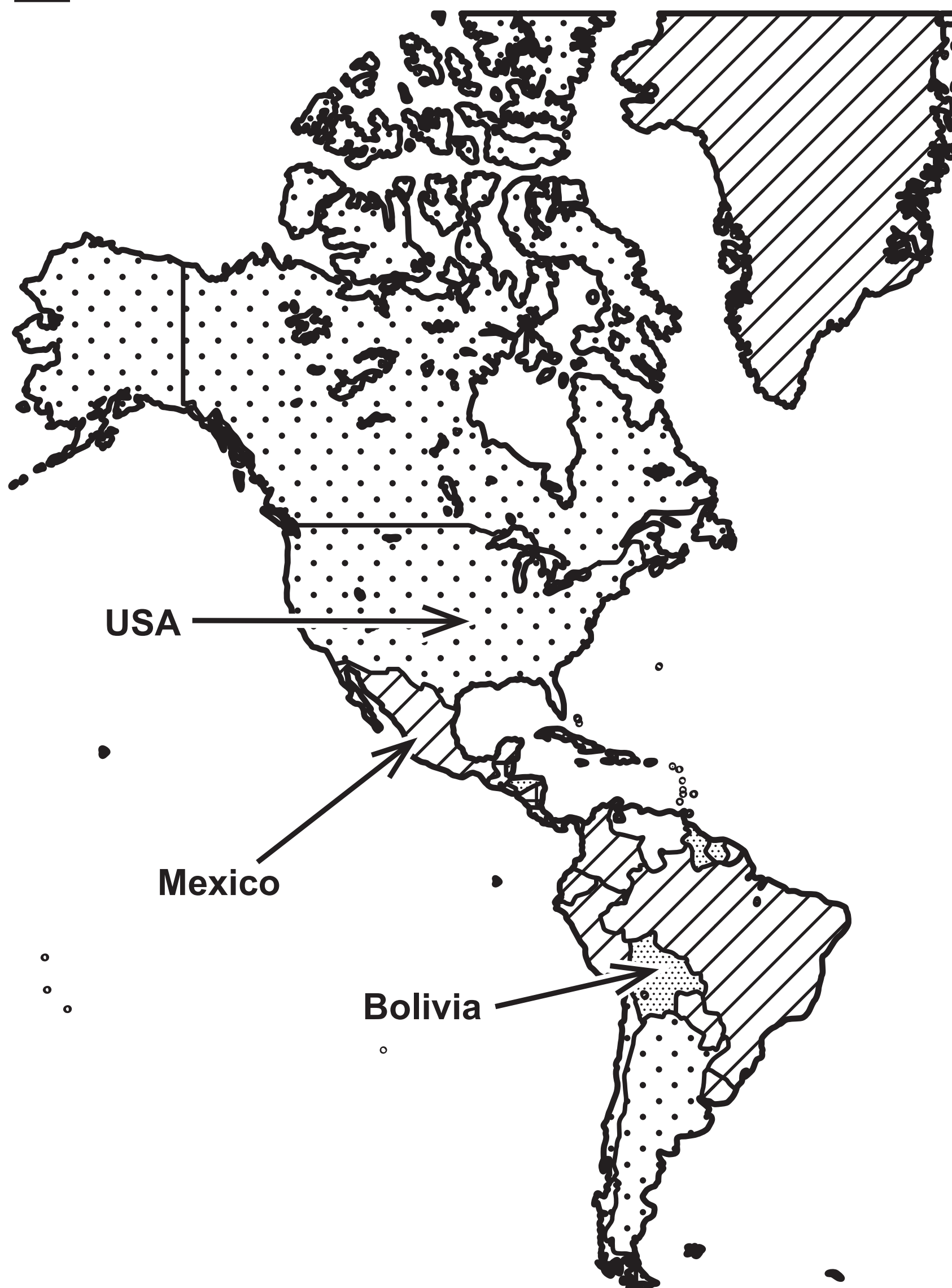


Percentage of the population not using the internet (2019)

KEY: Percentage (%) of population not using the internet





**Figure 8a – Black and White (Part 2)****Percentage of the population not using the internet  
(2019)****KEY: Percentage (%) of population not using the internet****0–25    26–50    51–75    76–100****Data not available**

Percentage of the population not using the internet (2019)

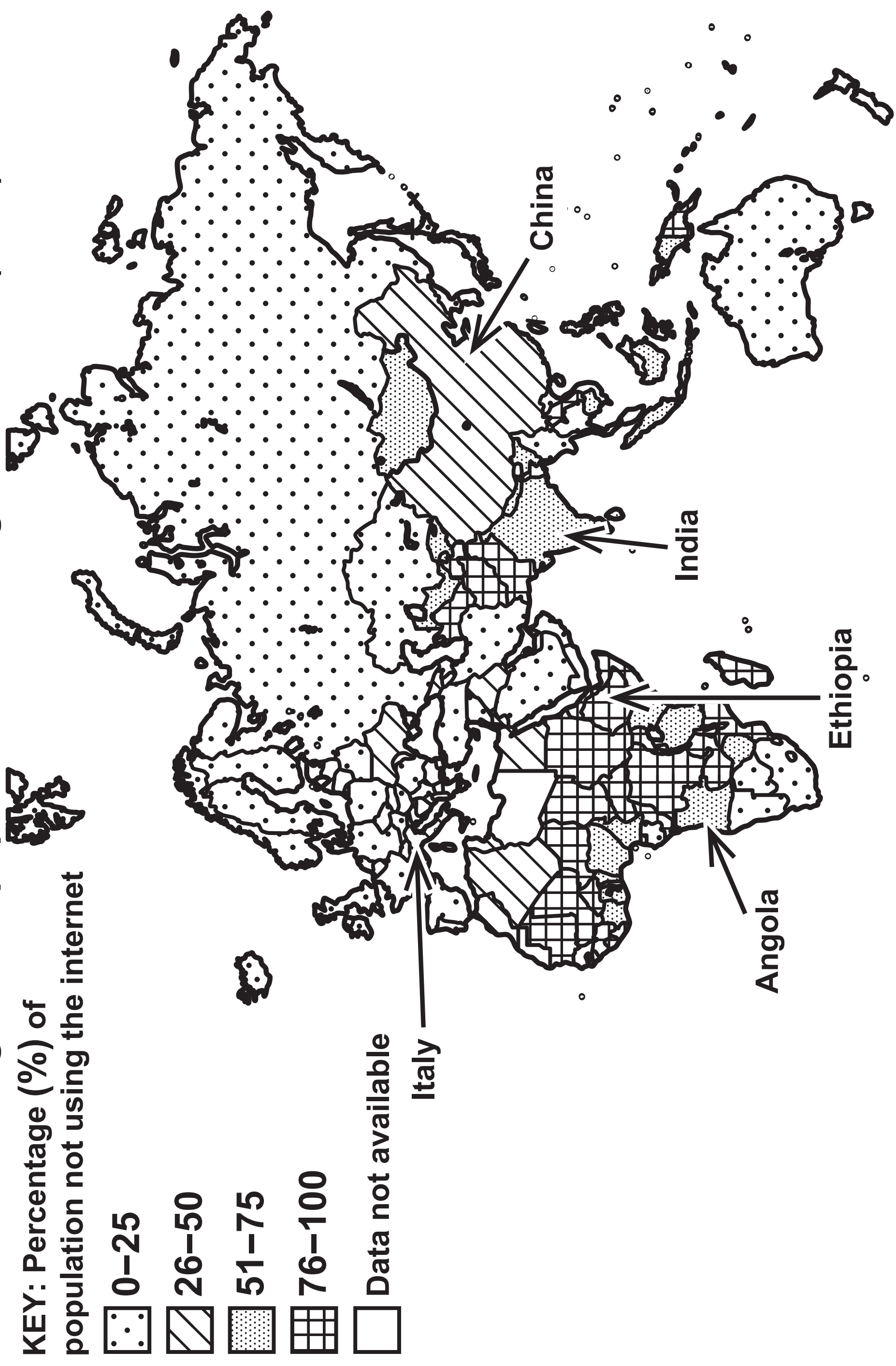




Figure 8b

Number of refugees and internally displaced persons, 2015–2019

KEY

 Refugees

 Internally displaced persons

Number of people  
(millions)

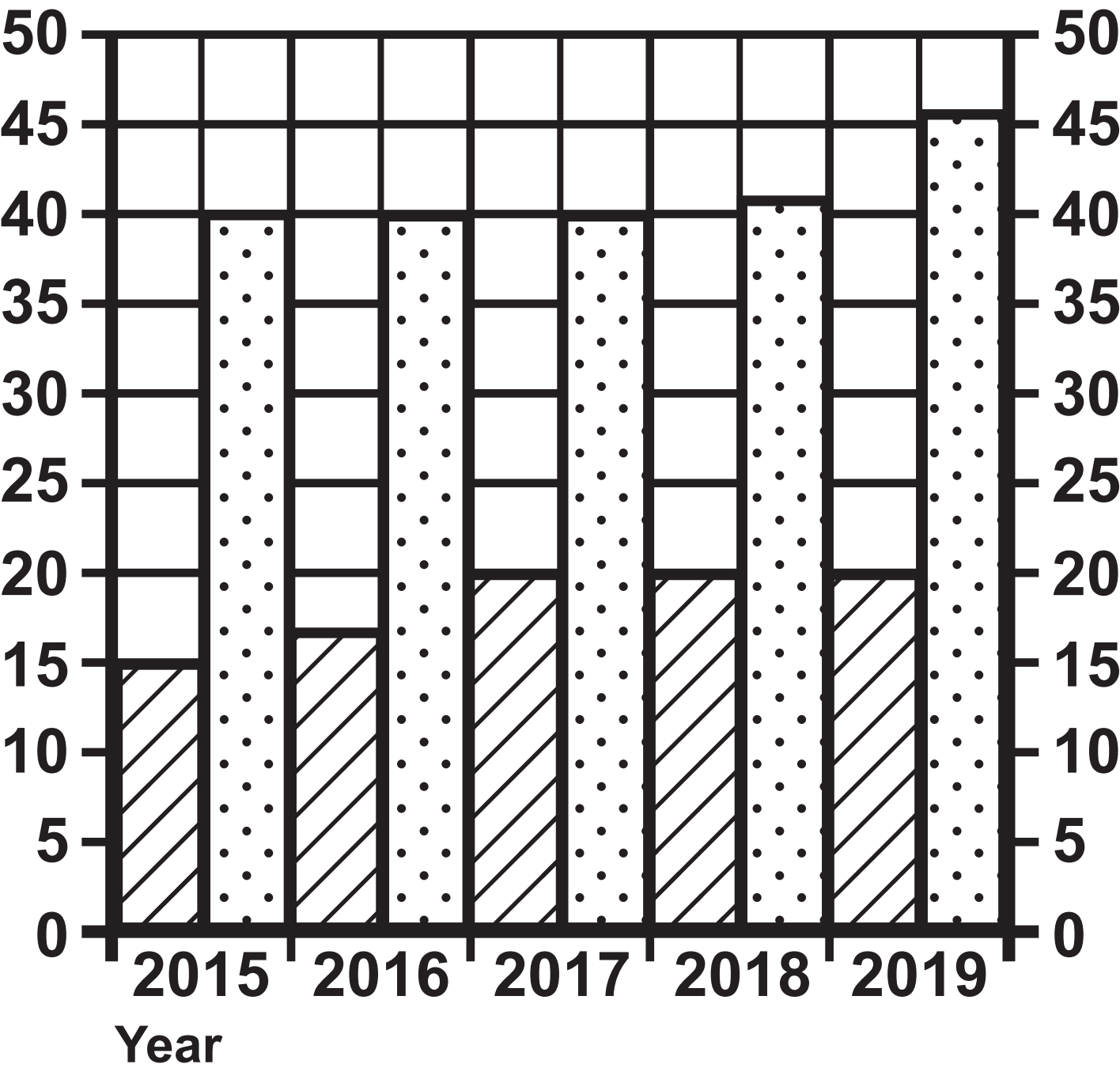


Figure 8c

Selected strategies to support sustainable tourism

Governments	Individuals/Organisation
Funding costs for repair	Eco-tourism
Limiting tourist numbers	Keeping to footpaths
Funding education about sustainable tourism	Buy local produce

Figure 9a – Colour (Part 1)  
Corruption Perception Index, 2018

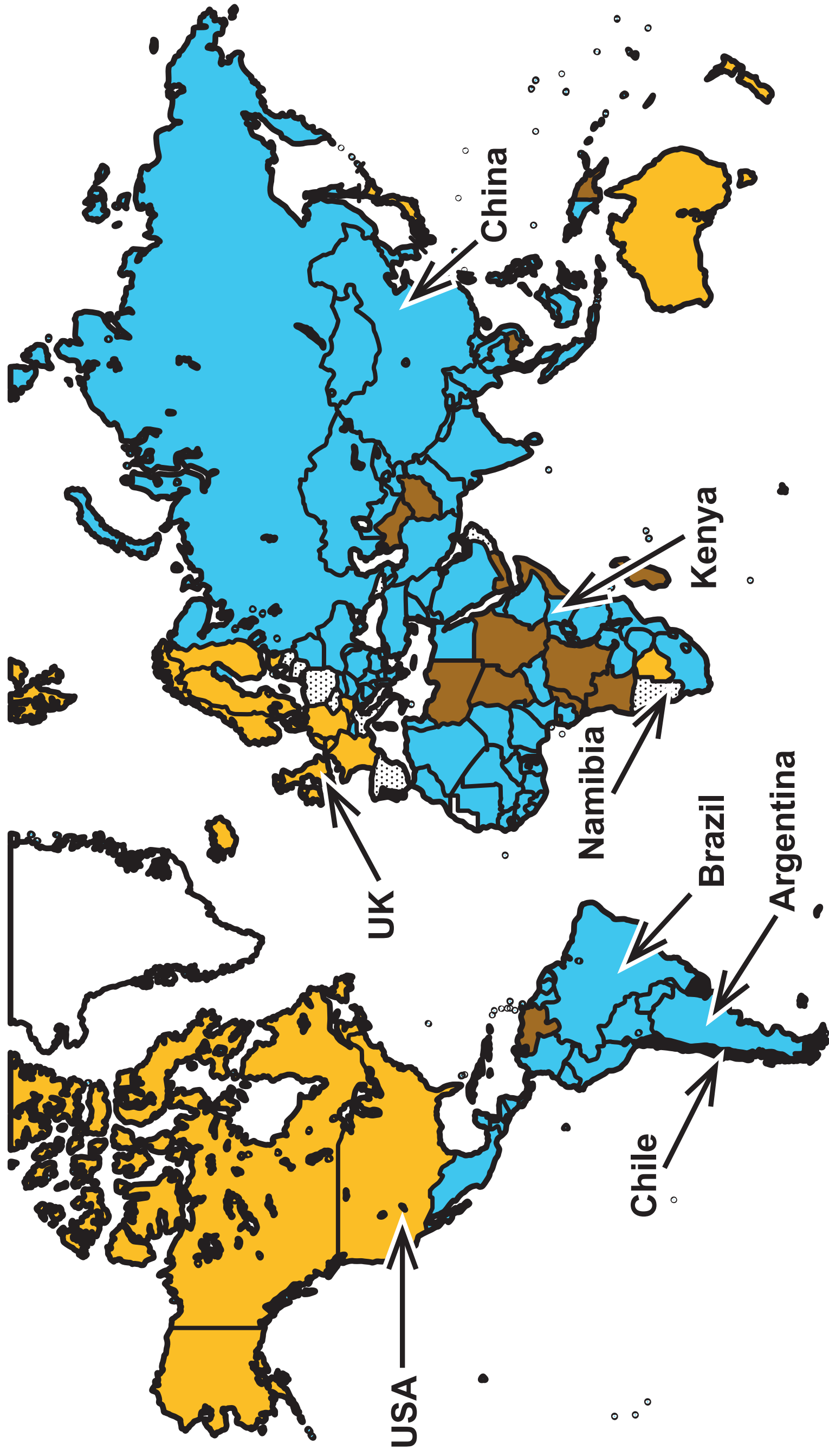
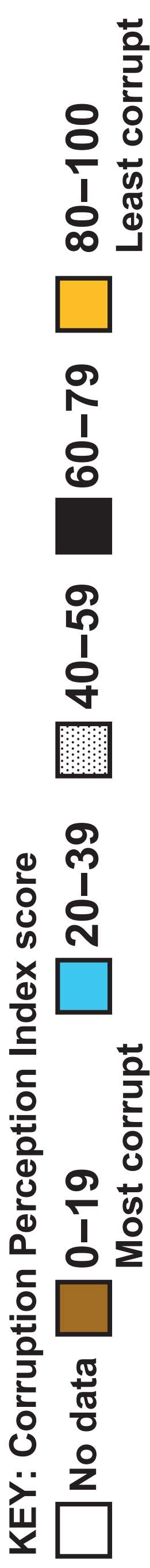


Figure 9a – Colour (Part 2)  
Corruption Perception Index, 2018

KEY: Corruption Perception Index score

No data	0–19 Most corrupt	20–39	40–59
60–79	80–100 Least corrupt		



Corruption Perception Index, 2018

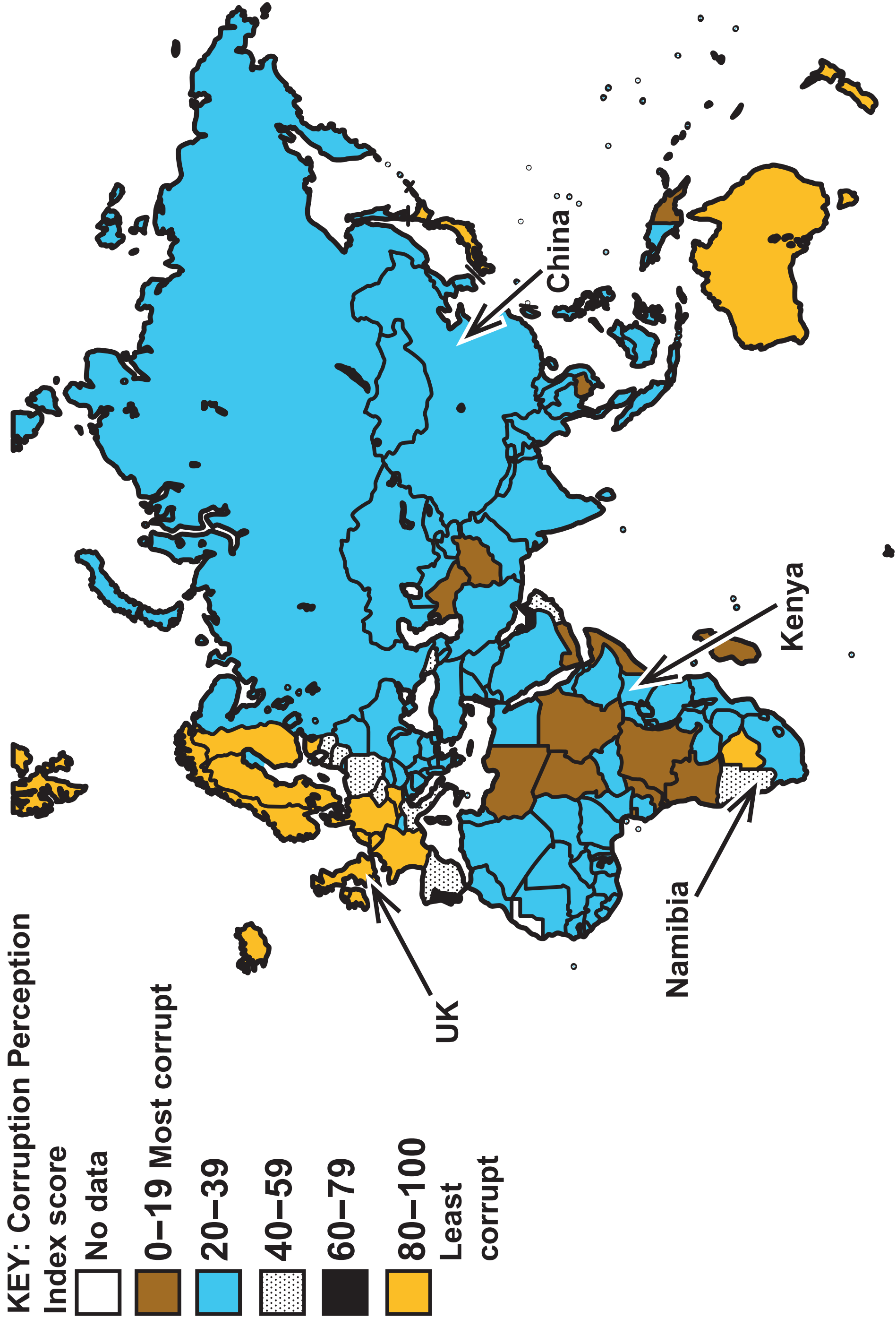


Figure 9a – Black and White (Part 1)

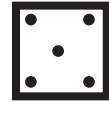
Corruption Perception Index, 2018

KEY: Corruption Perception Index score

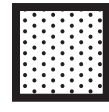
□ No data



0–19



20–39



40–59



60–79



80–100

Most corrupt

Least corrupt

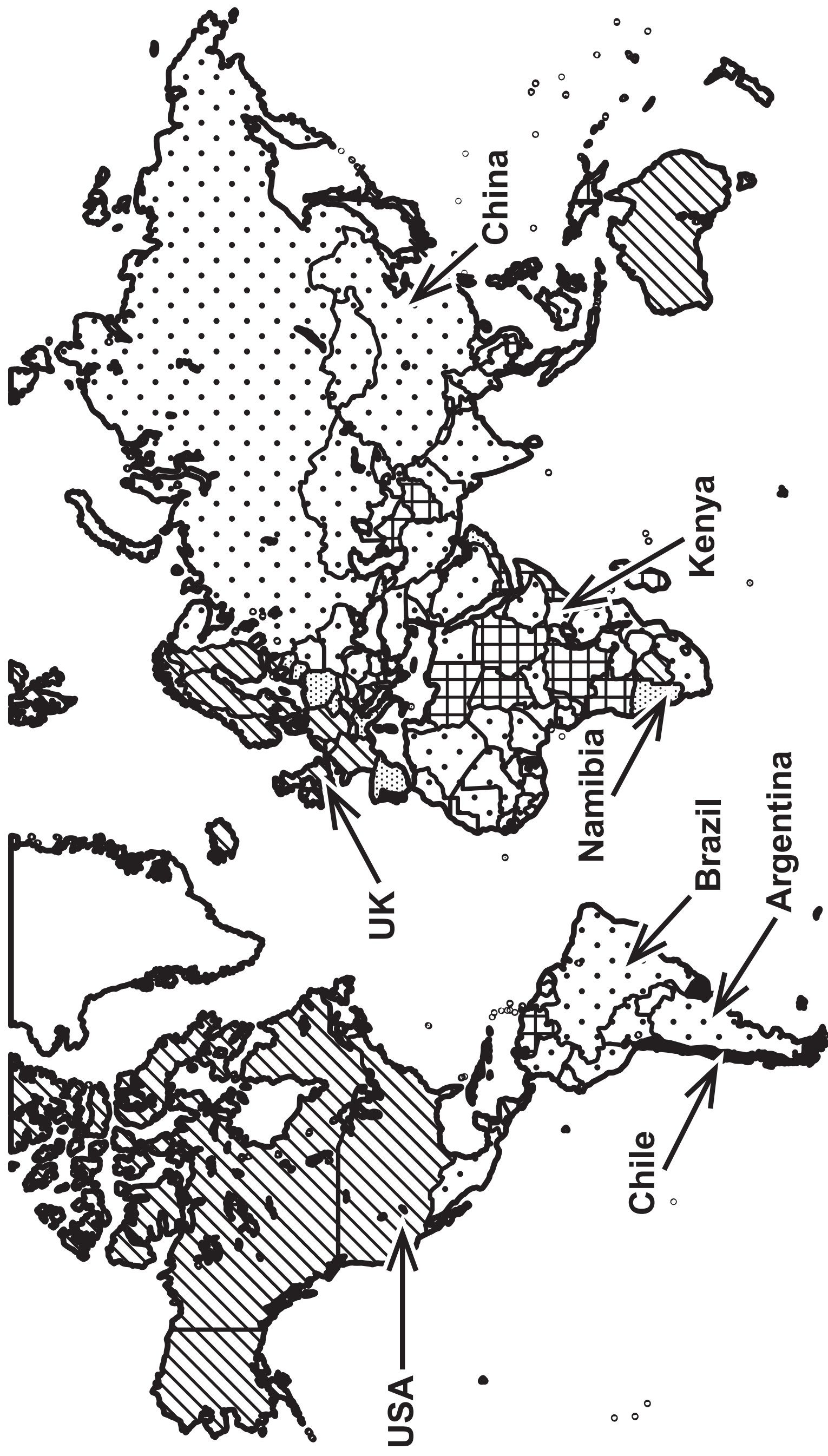










Figure 9a – Black and White (Part 2)  
Corruption Perception Index, 2018

KEY: Corruption Perception Index score

 No data	 0–19 Most corrupt	 20–39	 40–59
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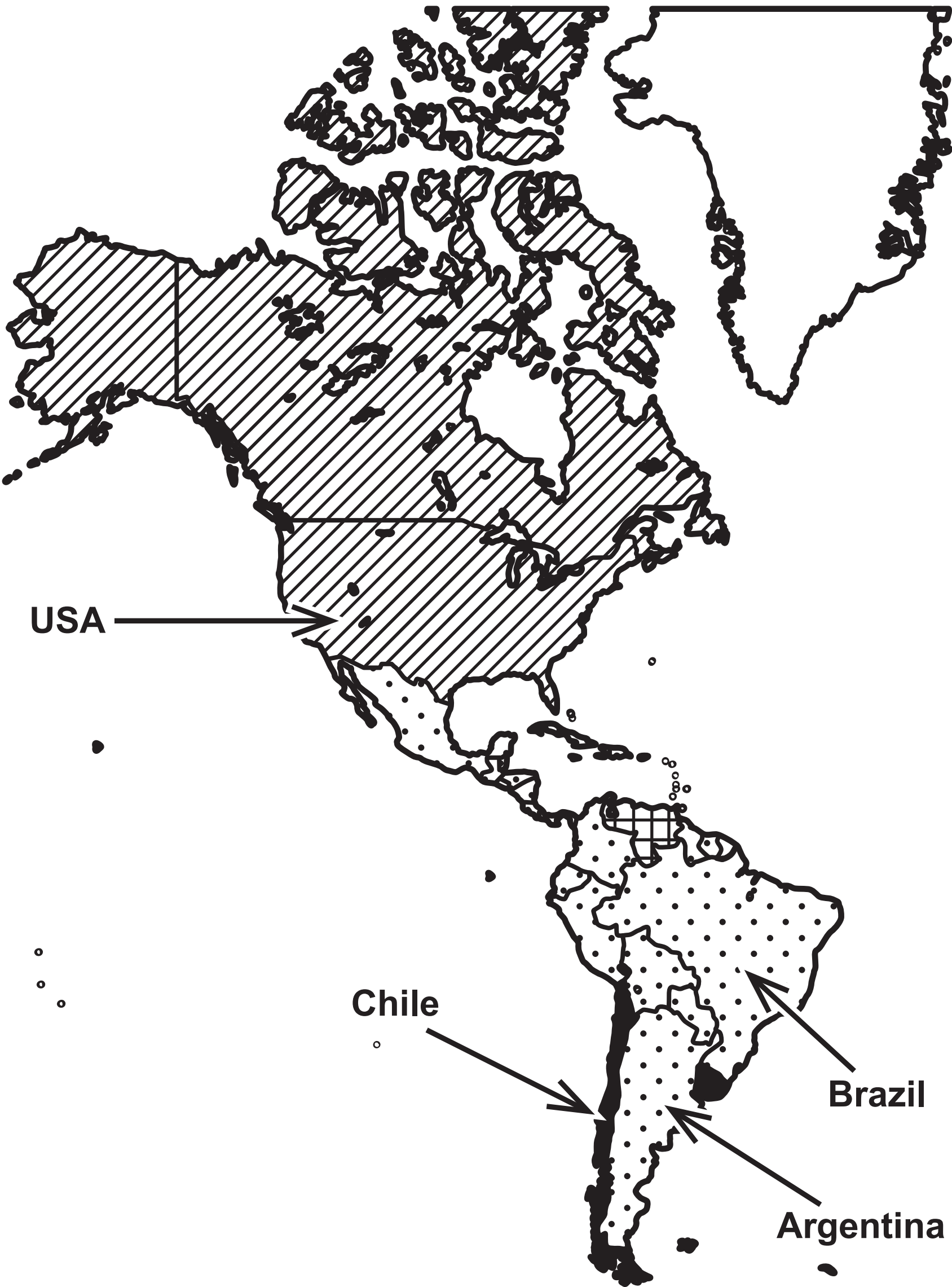


Figure 9a – Black and White (Part 3)

Corruption Perception Index, 2018

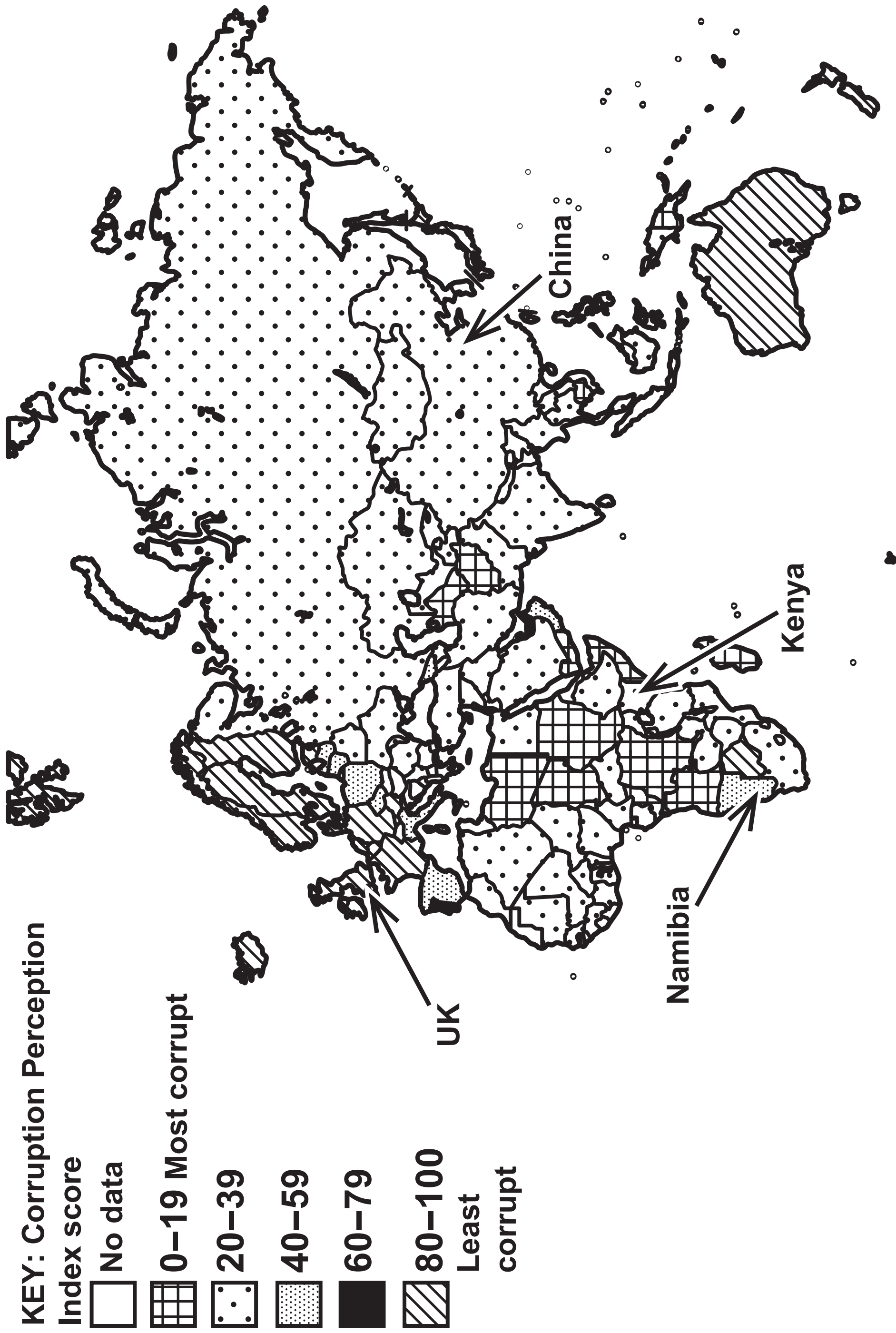




Figure 9b

Mortality rates for India and Canada, 1990–2018

KEY

- India
- Canada

Mortality rate  
(per 1,000 people)

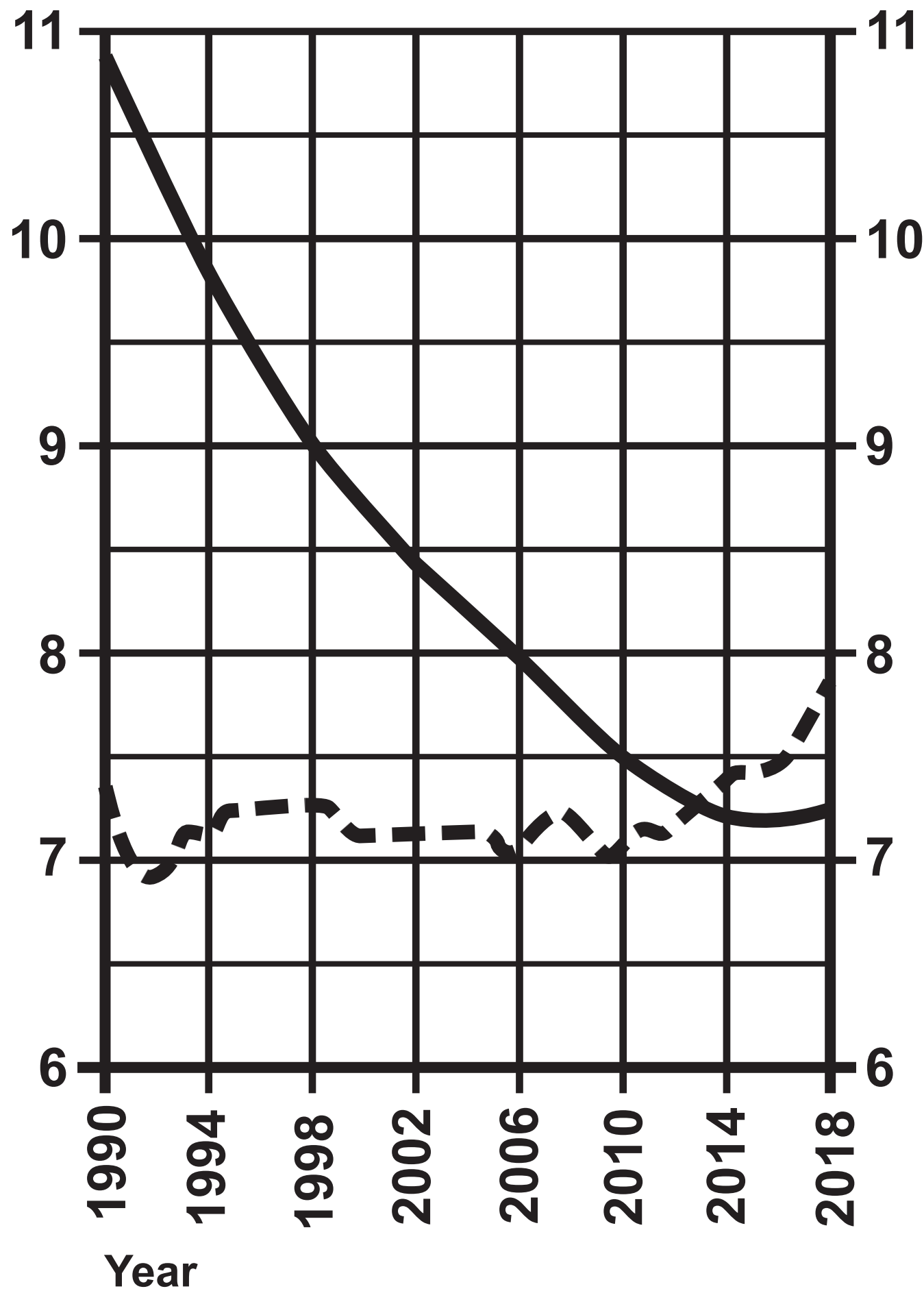


Figure 9c

Views on bottom-up projects

Government	Organisations	Individuals
Inefficient compared to large-scale investments.	Low-cost loans could help develop small businesses.	Focused on local communities.
Difficult to have an impact at the national level.	Can improve basic facilities, such as quality of water supply.	Provides opportunities for empowerment.

## Acknowledgements

Pearson Education Ltd. gratefully acknowledges all the following sources used in the preparation of this paper:

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[worldbank.org/indicator/SL.IND.EMPL.ZS?end=2019&](https://data.worldbank.org/indicator/SL.IND.EMPL.ZS?end=2019&locations=US-JP-GH-KH&start=1991&view=chart)

[locations=US-JP-GH-KH&start=1991&view=chart](https://data.worldbank.org/indicator/SL.IND.EMPL.ZS?end=2019&locations=US-JP-GH-KH&start=1991&view=chart)

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[worldbank.org/indicator/SL.AGR.EMPL.ZS?end=2019&](https://data.worldbank.org/indicator/SL.AGR.EMPL.ZS?end=2019&locations=US-JP-GH-KH&start=1991&view=chart)

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Figure 7a: Source adapted from [http://ossfoundation.us/](http://ossfoundation.us/projects/environment/global-warming/myths/images/changes-future/desertification_map_1920w.jpg/image_view_fullscreen)

[projects/environment/global-warming/myths/images/](http://ossfoundation.us/projects/environment/global-warming/myths/images/changes-future/desertification_map_1920w.jpg/image_view_fullscreen)

[changes-future/desertification\\_map\\_1920w.jpg/image\\_view\\_](http://ossfoundation.us/projects/environment/global-warming/myths/images/changes-future/desertification_map_1920w.jpg/image_view_fullscreen)

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Figure 8a: Source adapted from [https://itu.foleon.com/itu/](https://itu.foleon.com/itu/measuring-digital-development/offlinepopulation/)

[measuring-digital-development/offlinepopulation/](https://itu.foleon.com/itu/measuring-digital-development/offlinepopulation/)

Figure 8b: Source data adapted from: [https://www.unhcr.org/](https://www.unhcr.org/refugee-statistics/download/?url=R1xq)

[refugee-statistics/download/?url=R1xq](https://www.unhcr.org/refugee-statistics/download/?url=R1xq)

Figure 9a: Source adapted from: [https://ourworldindata.org/](https://ourworldindata.org/grapher/ti-corruption-perception-index)

[grapher/ti-corruption-perception-index](https://ourworldindata.org/grapher/ti-corruption-perception-index)

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## Acknowledgements continued.

Figure 9b: Source adapted from: <https://data.worldbank.org/indicator/SP.DYN.CDRT.IN?locations=IN&start=1990>  
<https://data.worldbank.org/indicator/SP.DYN.CDRT.IN?locations=IN&start=1990>