



Small and simple actions to **address climate change**

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Saving lives, changing minds.

 International Federation
of Red Cross and Red Crescent Societies

The International Federation of Red Cross and Red Crescent Societies (IFRC) is the world's largest volunteer-based humanitarian network. With our 190 member National Red Cross and Red Crescent Societies worldwide, we are in every community reaching 160.7 million people annually through long-term services and development programmes, as well as 110 million people through disaster response and early recovery programmes. We act before, during and after disasters and health emergencies to meet the needs and improve the lives of vulnerable people. We do so with impartiality as to nationality, race, gender, religious beliefs, class and political opinions.

Guided by *Strategy 2020* – our collective plan of action to tackle the major humanitarian and development challenges of this decade – we are committed to saving lives and changing minds.

Our strength lies in our volunteer network, our community-based expertise and our independence and neutrality. We work to improve humanitarian standards, as partners in development, and in response to disasters. We persuade decision-makers to act at all times in the interests of vulnerable people. The result: we enable healthy and safe communities, reduce vulnerabilities, strengthen resilience and foster a culture of peace around the world.

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Climate change is not just a problem for the future. It is happening now and is already affecting mostly poor and vulnerable people all over the world.

When it protects the most vulnerable people and strengthens their resilience, the Red Cross and Red Crescent (the Movement) is guided by its motto: *Saving lives, changing minds*. In a resolution passed at its 30th International Conference in 2007, the Movement undertook to address the causes and humanitarian consequences of climate change. At the 32nd International Conference, it launched the One Billion Coalition for Resilience, to support one billion people at risk, not least from climate change.

During the last decade, the Movement has demonstrated that climate change can be addressed by a range of actions, approaches and strategies. They include long-term programmes that reduce community vulnerability, programmes that draw on climate and weather information to make development and risk-reduction initiatives more robust or 'climate-smart', and awareness-raising programmes that enable communities and policy-makers to mobilize funding and take actions for adapting to climate change and mitigating its impact.

This paper presents a different approach. It sets out several simple strategies that can help to manage the unavoidable impacts of climate change (adaptation) and curb its long-term effects by reducing greenhouse gas emissions (mitigation). Though the problem may seem huge and paralyzingly complex, National Societies can implement *five straightforward* actions that will benefit the safety, livelihoods, health, attitudes and quality of life of people at risk.

1. Heatwave awareness and preparedness.
2. Planting and caring for trees.
3. Campaigns to clean and recycle solid waste.
4. Promotion of fuel-efficient stoves.
5. Capacity building and promotion of family emergency planning.

These small and simple actions can be stand-alone activities, distinct campaigns, or elements of longer term programmes by National Societies that are beginning to engage with climate change. They can also inspire new projects, or be integrated in existing projects, that promote health, food security, livelihoods, disaster risk reduction, preparedness and recovery, thereby building resilience in the face of a changing climate.

An initial word of caution is due. It is not appropriate to implement the five actions in every context. As always, involve volunteers and beneficiaries in decision-making. Together with them, identify initiatives that will attract support and generate tangible benefits locally and further afield.



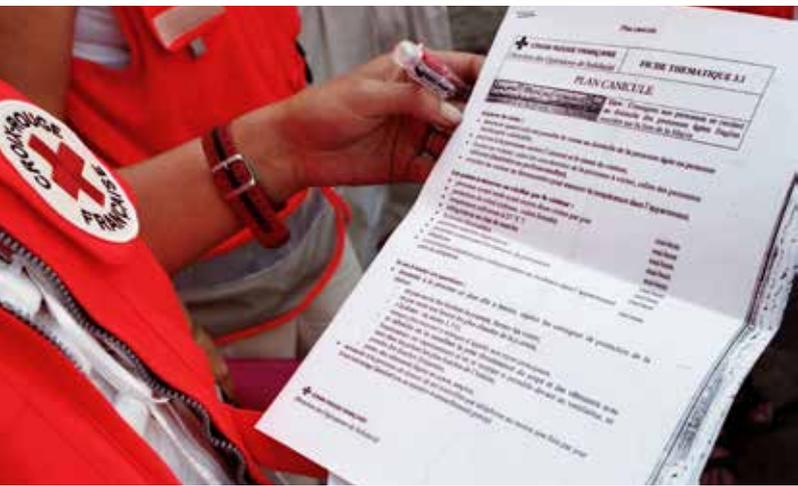
1. Stay cool

Heatwave awareness and preparedness

Worldwide, the number, intensity and duration of heatwaves have increased since 1950, a trend that is expected to continue. Though less spectacular than other extreme events, their impact can nevertheless be compared to that of hurricanes, floods and earthquakes. They can even affect heat-tolerant populations if these are caught unaware. Heatwaves in May 2015 caused 1,100 deaths in India, and many deaths in Morocco, Portugal and Spain. Scientists concluded that the European heatwave of June-July 2015 was almost certainly exacerbated by climate change.

Unusual heat causes shock and dehydration and worsens chronic cardiovascular and respiratory diseases. City-dwellers are especially at risk because the absence of vegetation and moisture-trapping natural surfaces in urban spaces helps to create 'heat-islands'. The temperature difference between adjacent rural and urban areas may be as much as 3°C.

French Red Cross volunteers apply a thematic checklist while visiting an elderly lady in 2015. Pascal Bachelet/
French Red Cross Society.



Story
from the
field

French Red Cross volunteers visit the elderly during heatwaves

After 35,000 Europeans died in a heatwave in 2003, several National Societies established heatwave plans. These featured messages and tools that could easily be understood, implemented and scaled up. Because high temperatures can be predicted weeks in advance, there is time to step up preparedness and activate volunteers and the public. In France, volunteer networks played a pivotal role by making weekly visits to isolated elderly people and applying the guidelines listed below.

Before visiting

- Announce your visit beforehand whenever you can.
- Obtain the contact details of both the person you visit and his or her family members. (In France, local governments maintain a list of vulnerable elderly people.)
- Take a thermometer with you to check room temperature.

Questions to ask

- Does the person receive at least two visits a day?
- Is s/he protected from the sun by curtains or blinds?
- Is the temperature below 25°C?

- Is the refrigerator working?
- Are drinks available?
- Is s/he lightly clothed?
- Is s/he aware of prevention measures?
- Does s/he have a telephone?
- Are important phone numbers listed by the phone?

Even if the answer to all questions was 'yes'

- Remind him or her of safety rules: take frequent showers, drink at least 1.5 litres a day, wear thin and loose clothes, etc.

Checklist for heatwave preparedness

National Society headquarters

- Receive and disseminate heatwave warnings. Ask your meteorological office to send warnings to dedicated focal points. Communicate potential actions to local branches and partners.
- Prepare a heatwave contingency plan and train staff and volunteers to implement it.
- Think ahead. In countries facing water stress, inform households that they need to store water before hot spells.

Volunteers in the field

- Avoid dehydration. Hand out water during public events and in traffic jams. Elderly people may be unable to recognize their thirst: remind them to drink water and soup regularly. Warn people to avoid alcoholic drinks, sweet drinks, and very cold drinks (which can cause stomach cramps).
- Stay cool. Offer people wet towels to wrap around their necks; keep curtains or blinds closed.
- Promote solidarity and care. Ask people to reach out to family, neighbours and friends, especially those who are most vulnerable.
- Protect from the sun: wear sunscreen, sunglasses, hats.
- Involve young people. Ask them to participate in care and community activities.
- Rest and stay at home, especially during peak hours.
- Pay particular attention to the elderly, the chronically ill, and children.

2. Love the environment

Plant and care for trees

The Red Cross Red Crescent has a long track record of tree planting and reforestation. Examples include mangrove reforestation in Viet Nam (where more than 12,000 hectares of mangroves have been planted since 1994), and slope reforestation in the Democratic People's Republic of Korea, Ethiopia and Kenya (where more than 2.5 billion trees will be planted by 2018 through the Sustainable Environment and Restoration Programme).

Tree planting on a large scale helps both to mitigate climate change and adapt to it, and brings a range of health and economic benefits. Growing trees absorb carbon dioxide (CO₂), one of the main greenhouse gases causing global warming; it is locked in while the trees remain alive.

Trees also prevent soil erosion and land degradation, lowering the risk of landslides and floods and potentially increasing crop yields. They give shade during heatwaves and provide non-timber products that can sustain livelihoods (fodder, green manure, feed for livestock). Mangrove forests shield coasts from wave damage in typhoons and storms: they can reduce a 1.5 metre wave to ripples and are seven times more cost-effective than dykes.

For large-scale results, one must start small. Every tree adds to an existing forest, stores a little CO₂, provides shade, retains soil and rain water, and improves underground water levels. Planting a tree is also a potent awareness-raising activity.

Pupils in Worgadja display the benefits of trees. Isabelle Desportes/Ethiopian Red Cross Society.



Pupils plant trees in Ethiopia

Story from the field

This project in northern Ethiopia focuses both on tree roots and rooting environmental values in youngsters' minds. Worgadja

school's environment club in Northern Ethiopia has combined both goals since 2012. As described by the club's 13 year-old president: 'Every pupil plants and is responsible for five tree seedlings. In total, we have 2,000. We have to weed and water them every week. There is not much rain in our area.'

According to another pupil, children did not at first understand why they should plant trees. 'But now we see

that it gives us shade, and looks nicer than bare school surroundings. It is important for the environment and for us.' The young gardeners tell their parents about tree planting, and about the Ethiopian Red Cross nursery site where they can obtain seedlings. In cooperation with the Netherlands and Ethiopian Red Cross, teachers assist pupils to plant seedlings and teach them about the role trees play in helping to mitigate and adapt to climate change, and the general need for cleaner surroundings. The school installed waste baskets and dug a well. When the children are on holiday, a simple plastic bottle drip-irrigation system takes over. Next step – planting vegetables and fruit trees.

Checklist for tree planting

National Society headquarters

- Involve local experts, for example from the Ministry of Agriculture or Forestry, to advise on tree selection and planting techniques. Seek technical advice when planting trees in coastal areas and on slopes.
- Involve members of the community. Run campaigns to raise public awareness of the importance of preserving forest cover and planting new trees. Develop participatory activities such as games.
- Link your programmes and activities to national environmental and climate change plans.

Volunteers in the field

- Organize a tree-planting day. Involve local and social media.
- Involve schoolchildren through school clubs. Every child can take responsibility for a tree and monitor its growth. Provide sessions to help pupils understand the role trees play in mitigating climate change and reducing the risk of erosion and floods.
- Create tree nurseries. Seek technical advice when you do so. Invite community members to obtain seedlings from the nurseries to plant around their homes.
- Encourage community tree nurseries. Promote competitions among households and groups.
- Think carefully about planting locations. Do not site trees too close to dwellings, because they may fall in heavy winds.
- Promote inter-cropping to improve nutrition and food production.

3. Eliminate plastic bags

Solid waste cleaning and recycling campaigns

Worldwide, around 500 billion plastic bags are consumed annually. Their production requires 60 million barrels of oil; they take up to 1000 years to decompose. In addition to worsening climate change by releasing tons of carbon dioxide into the atmosphere when they are produced, they damage marine species (by reducing long-term food security), clog drains (creating standing water and breeding sites for disease vectors), affect the fertility of small-scale farmers' land, and litter the environment with solid waste.

Cleaning campaigns offer an easy and meaningful way to improve the environment, and make the public more aware of the impact of plastic waste on the environment as well as opportunities to recycle it. In some developing countries, the recycling of waste and salvaged plastic bags in dedicated facilities can generate income.

Story
from the
field

Sri Lanka Red Cross communicating about its cleaning campaign

with volunteers and community members on International Coastal Cleaning Day, 19 September 2015

Sri Lanka Red Cross Society added 12 new photos.
21 September · Edited

Cleaning up the coast for a better environment. Coast conservation Authority and the District Secretary's Office of Kalutara organized a coastal belt cleaning program behalf of International Coastal Cleaning Day which fell on the 19th of September 2015. Our volunteers and members were there to support them.

Meanwhile members and volunteers of our Mullativu branch also hosted a coast cleaning campaign in Mullativu in view of this day.

Read more - <http://www.redcross.lk/.../cle...> See More



Checklist for a plastic bag cleaning campaign

National Society headquarters

- Through awareness campaigns and participatory activities such as games, explain to the community why it is vital to sort and recycle garbage and reduce the use of plastic bags.
- Point out the benefits of recycling and sorting waste products, including opportunities to generate income.
- Branches should cooperate with their local authorities to organize joint awareness-raising and cleaning campaigns.
- Create demonstration sites to show the benefits of solid waste management.
- Collaborate with the authorities to pass regulations that ban or reduce the use of plastic bags and promote use of local materials in their place.

Volunteers in the field

- Hold a community clean-up campaign with youth groups or the community; promoting hygiene and protection (wearing gloves, collection bags, etc.).
- Use social and local media to spread information and inspire the public.
- Organize regular clean-up activities to maintain trenches and drains.
- Through the school curriculum, sensitize children to littering and the benefits of a clean environment.
- Over the longer term, promote the everyday use of reusable bags as sustainable alternatives to plastic bags.

4. Fuel-efficient stoves: environmental and health protection

Wood is often expensive to buy, or must be brought in from a long distance. Using it as a fuel may injure lungs and eyes, and children are often burned by accidents around open fires. The fuel-efficient stoves that National Societies promote in several countries particularly benefit women and children. Because they store heat longer, and burn grass, weeds, crop residues and small twigs, they also benefit the environment and climate. Reducing the consumption of firewood slows or prevents deforestation. CO₂ remains stored in trees instead of being released as a greenhouse gas, and urban and peri-urban households save money.

*A new 'ecofone' in Miramar.
Maya Schaefer/Nicaragua
Red Cross Society.*



Fuel-efficient stoves in Nicaragua and Guatemala

Story from the field

In the Americas, fuel efficient stoves are usually called 'ecofones' or 'eco-stoves'. At the request of the community of Miramar, the Nicaraguan Red Cross supported construction of the fuel efficient stoves. A local specialist designed an appropriate stove for the village, and taught two local youngsters to equip and train households in their use. Community members reported many health benefits, and a 40 per cent decrease in firewood consumption.

that consumption of firewood (from pine, alder and oak) fell by 60 per cent, reducing deforestation by eight hectares a year while helping to protect water sources and lowering the risk of landslides.

A similar project in Guatemala installed 60 stoves in the village of Xatinap V. The Guatemala Red Cross estimated

Checklist for fuel efficient stoves

National Society headquarters

- Fuel-efficient stoves have probably already been constructed in your region. Consult community members, local authorities, the Ministry of Environment, UN agencies, or NGOs, to identify the best model for the local context.
- Best practice on distribution will vary. It is usually inappropriate to simply distribute ready-made stoves. Seek technical advice to determine the best production and distribution arrangement.
- Do no harm! Your interventions may disrupt local value chains, such as firewood retailers, who might play a vital role in producing and marketing improved stoves.
- Involve community members in the production of locally appropriate stoves and make production sustainable by peer to peer support.

Volunteers in the field

- Explain to communities the benefits of fuel-efficient stoves, and why they should be used.
- Take account of the community's preferences when stoves are constructed. (For example, parents may want higher stoves, to prevent small children from reaching pots and pans.)
- Document how improved stoves are used, their impact on reducing land degradation, and other benefits.

5. Heed warnings and take action: climate-smart ‘family emergency plans’

When disasters strike, our volunteers are often among the first to provide relief. More suffering could be avoided if donors, communities, and the Red Cross and Red Crescent Movement took action in advance of disasters, using graduated warning levels to signal the degree of risk.

The Movement is currently investing in more people-centred early warning systems that use climate data and forecasts to determine what ‘early actions’ should be taken in specific regions. The table below shows that lead time is a key variable. If contingency plans are prepared in advance, setting out appropriate early actions, this will strengthen the capacity of people and communities at risk, and National Societies, to manage extreme weather events caused by climate change.

Any National Society can help to identify appropriate responses to local hazards, based on available warnings. The table below, on flood risks, shows that a variety of actions can be taken to deal with hazards. One overarching recommendation is: do not underestimate traditional knowledge and warning systems; build on local institutions and networks as much as possible.

In Bihar, northern India, Ready! is played during pre-monsoon flood preparedness. Knud Falk/Red Cross Red Crescent Climate Centre.



Story from the field

Climate games to strengthen preparedness

Games are a fun but serious way to learn and plan. In the last five years, the Red Cross Red Crescent Climate Centre and its partners have designed at least 45 new games on humanitarian issues (including disaster preparedness, gender, food security, climate information, health, road safety, and the management of urban waste). Across five continents, in at least 40 countries, farmers, schoolchildren, Red Cross Red Crescent volunteers, meteorologists, students, government officials, climate policy negotiators, city-dwellers, staff of development banks, and donors, have explored the power of game-based learning.

For example, hundreds of communities in Latin America, Africa and Asia have played *Ready!* to help them develop or update preparedness plans before the rainy season. Against the clock, community members brainstorm together, listing and prioritizing the actions they would take if they received warnings of a disaster.

After the game their ideas are discussed and laid out in sequence to build the backbone of a community preparedness plan. Games generate ideas and collate people’s inputs in a realistic, participatory and agreed local action plan that is truly owned by the households who contributed.

Checklist for early warning early action: the example of floods

Time scale, with examples of early warning	Examples of early action at headquarter and community level	Examples of early action at household level, to be supported by volunteers
YEARS. The risk of extreme rainfall increases because of climate change.	Continually update risk maps.	Develop 'family emergency plans'. These list simple actions that are taken when warnings are issued.
	Identify changing vulnerable groups.	Take basic risk reduction measures. For example, construct local dykes or strengthen protective (mangrove) forest cover.
	Working in cooperation with local agencies (such as the meteorological office), ensure that early warnings reach vulnerable target communities in time. Messages should be easy to understand and in local languages.	Raise public awareness of changing risk patterns and more extreme weather by using participatory 'early warning' games facilitated by volunteers. Games should be tailored for the local context.
	Recruit additional volunteers.	Make the public aware of the warning value of weather forecasts. They are not perfectly reliable but much better than nothing.
MONTHS. Above-average rainfall is forecast for the coming season.	Revisit contingency plans.	Inform communities that risks have increased.
	Replenish stocks of blankets, water guards, etc.	Inform communities of contingency plans.
WEEKS. Ground saturation and forecasts of continued rain make flooding very likely.	Alert volunteers and communities.	Clear drains
	Meet with other response agencies to finalize arrangements for coordination.	Check and repair protective dykes around houses and fields.
	Monitor rainfall forecasts closely.	Take cattle and other livestock to high ground.
DAYS. Heavy rainfall and high water levels upstream are likely to cause floods.	Prepare for possible evacuation. (For example, put transportation on stand-by).	Put valuable items in a safe place (top shelves, higher storeys, etc.).
	Monitor the situation upstream closely.	Prepare an emergency bag to take with you in case of evacuation.
HOURS. Flood water is moving downriver to affected areas.	Initiate evacuation process.	Listen to the radio, evacuate when ordered or appropriate.

Toolbox

Detailed guidance to help you take action

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The French Red Cross has developed step by step guidelines on heatwave preparedness for volunteers, which are available on request. They cover heatwave patrols by mobile volunteer units, rest spots for the homeless, and water distribution in traffic jams. The [website](#) of the Centre for Disease Control and Prevention also provides practical heatwave guidelines and lists publications, including a booklet on climate change and extreme heat events.

This [wikihow](#) page provides advice on tree planting, including preparation, planting and tree care. The site includes short explanatory videos.

A Peruvian NGO has developed a practical [guide](#) for cleaning campaigns at different scales. It focuses on beaches, but most of the recommended steps are relevant to other locations.

Members of the community in Worgadja, Ethiopia, made a very useful [video](#) on fuel-efficient stoves. A [video](#) from Miramar, Nicaragua, provides practical information on stove materials and their construction and use.





The Fundamental Principles of the International Red Cross and Red Crescent Movement

Humanity The International Red Cross and Red Crescent Movement, born of a desire to bring assistance without discrimination to the wounded on the battlefield, endeavours, in its international and national capacity, to prevent and alleviate human suffering wherever it may be found. Its purpose is to protect life and health and to ensure respect for the human being. It promotes mutual understanding, friendship, cooperation and lasting peace amongst all peoples.

Impartiality It makes no discrimination as to nationality, race, religious beliefs, class or political opinions. It endeavours to relieve the suffering of individuals, being guided solely by their needs, and to give priority to the most urgent cases of distress.

Neutrality In order to enjoy the confidence of all, the Movement may not take sides in hostilities or engage at any time in controversies of a political, racial, religious or ideological nature.

Independence The Movement is independent. The National Societies, while auxiliaries in the humanitarian services of their governments and subject to the laws of their respective countries, must always maintain their autonomy so that they may be able at all times to act in accordance with the principles of the Movement.

Voluntary service It is a voluntary relief movement not prompted in any manner by desire for gain.

Unity There can be only one Red Cross or Red Crescent Society in any one country. It must be open to all. It must carry on its humanitarian work throughout its territory.

Universality The International Red Cross and Red Crescent Movement, in which all societies have equal status and share equal responsibilities and duties in helping each other, is worldwide.

Solutions for climate change mitigation and adaptation do not have to be as complex as the problem itself. Here we provide five straightforward actions that can be implemented by National Societies.

1. Heatwave awareness and preparedness;
2. Planting and caring for trees;
3. Solid waste cleaning and recycling campaigns;
4. Promoting fuel-efficient stoves; and
5. Capacity building and promoting of family emergency planning.

For general guidance or more information on any of these actions, please contact:

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