

WINTERIZATION RECOMMENDATIONS | GAZA SHELTER RESPONSE

2025-26

Through 2025, shelter conditions in Gaza have sharply deteriorated. Over 86.5% of Gaza is militarized or under evacuation orders (as of 10 September 2025),¹ there is a continued cycle of multiple displacements and replenishment of shelter materials has not been possible following a complete blockade of shelter items for 6 months since March. While some easing is expected, material inflows remain minimal— at the time of writing this document, on 15 September 2025, only 1,448 tents have reached Gaza's Middle Area, with none reaching the north.

Repeated displacements, combined with limited transport capacity, have forced families into overcrowded, unsafe shelters or damaged buildings that fail to meet basic emergency standards, lacking protection from the weather elements and access to services.

Based on Shelter Cluster's broad estimations, 1.50 million people in Gaza are in need of shelter materials and 1.50 million individuals² of need of household items (September 2025). As of mid-September, very few partners have received approvals on some shelter items. The registration of organizations, approval of materials, timeline on customs clearance processes and which areas of Gaza Strip can be assisted with shelter items is not known and the continued uncertainty hampers planning and provison of assistance.

With winter approaching, the window for large-scale shelter assistance is closing fast. Immediate and consistent approvals and access are critical to enable a life-saving winterization response.

Winterization Overview

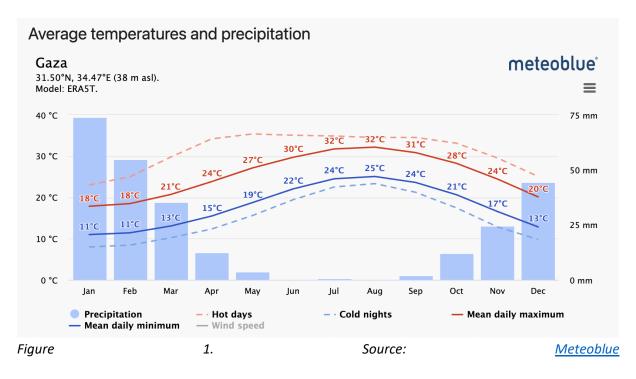
This document outlines recommendations and priorities for winterization support as part of the Shelter Cluster's efforts to reduce risks and support dignified living conditions during the winter months and beyond, building on lessons learned from the response in the last two winters through Gaza's protracted emergency. The response requires coordinated efforts from partners and timely implementation to provide household items for winter or shelter assistance.

Although Gaza does not have extreme winter, with minimum temperatures above 5 degrees Celsius during nights, it faces rainy days, high humidity and strong winds (see Figure 1 below), and the lack of adequate shelter and energy to heat them presents an additional challenge to all the multi-sectoral difficulties faced by families. Households living along Gaza's coastal areas face severe challenges during winter, as many shelters are damaged or flooded, and essential non-food items are often swept away by rising sea waters, leaving families exposed to harsh weather and increased vulnerability.

¹ <u>Site Management Cluster, Population Movement Monitoring Flash Update.</u>

² This estimation will likely increase with the ongoing forced displacement from Gaza City.





Given the current scale of needs in Gaza, Shelter Cluster's winterization priority is to ensure large-scale coverage of emergency shelter and household items to provide basic weather protection. Building on the lessons learnt from last winter and considering market instability, Shelter Cluster recommends provision of essential household items, including winter bedding kits and winter clothing. Winterization efforts include coordination with other Clusters, especially WASH and SMC on determining assistance modalities for households close to low-lying flood risk areas. Shelter partners may also coordinate with SMC on provision of household level site improvements such as digging of drains around shelters.

Anticipated Winter Challenges

There are already extremely high humanitarian needs in Gaza, and these are expected to rise sharply with the ongoing evacuation of Gaza City. This creates immense challenges for humanitarian operations to meet critical needs in time for winter, particularly given the lack of clarity regarding approvals for essential items, entry points, and overall access.

A majority of families being forcibly displaced from Gaza City will move to the south and are expected to concentrate in Khan Younis and Deir al-Balah³. These areas are already severely congested, and additional displacement will further strain limited resources. This congestion will make the upcoming winter even harsher, especially for those living near the coastal and low-lying areas where the risk of flooding is high. Mitigating flood risks in such crowded conditions presents significant challenges such as lack of space for drainage, limitations in raising the shelters above ground, and protection from strong coastal winds. Without space or equipment for heating, people may resort to dangerous coping mechanisms for heating in congested spaces, leading to fire risk. Overly congested areas will make it nearly impossible for movement and access to services for persons with disabilities and older persons.

³ Gaza Preparedness and Operational Plan - September 2025, OCHA.



Displaced families are expected to arrive with limited to none of their essential items, including tents, due to prohibitively high transportation costs. This situation disproportionately affects vulnerable groups, particularly persons with disabilities, who face even higher transportation costs.

In the north, major military operations in Gaza City are likely to curtail or completely block humanitarian access. This means prolonged periods with little or no assistance for those remaining, leaving them highly vulnerable, with limited coping capacity, often scattered and in precarious sheltering⁴.

Summary of Gap Analysis

Below is the pipeline analysis extracted from Shelter Cluster's monthly 5W⁵ reporting. However, it should be noted that this summary only outlines the pipeline, but access of items into Gaza is extremely negligible in quantity and continues to remain uncertain.

1. Shelter

		Tents			SoKs	
		1	.5 M individuals	n need of shelte	er	
	Pipe	eline	Gap	Pip	eline	Gap
Across Gaza	completed	ongoing	Ou.p	completed	ongoing	- Gup
Strip	50,758 tents	31,800 tents	178,000 tents	568,000 kits	440,000 kits	ZERO

2. Household Items

		Blankets			Solar lamps	
		1.5 M	individuals in no	eed of househol	d items	
Agraca	Pip	peline	Gap	Pipe	eline	Gap
Across Gaza	completed	ongoing		completed	ongoing	
Strip	930,000 pieces	1,645,000 pieces	ZERO	23,600 units	5,600 units	250,000 units

Table 1: Pipeline and Gaps, Shelter Cluster 5W.

Notes

1) **Shelter:** The above calculation assumes that 1.5 million persons are in need of an emergency shelter i.e. tents. The SOK pipeline is considered as a secondary replenishment over the primary tent needs considering the high levels of ongoing displacement.

One tent serves emergency shelter needs of one family of 5.6 persons with no shelter or a deteriorated shelter, while one SoK serves one family to improve their temporary shelter or to seal off a partially damaged housing unit.

⁴ Humanitarian partners will continue to operate in the north as long it is possible. Advocacy for access of shelter materials to the north is ongoing; refer to Shelter Cluster's position on <u>resumption of shelter materials to</u>

⁵ Palestine | Shelter Cluster Dashboard.



- 2) **Household Items:** To meet basic humanitarian winterization needs, consider one blanket per person and one solar lamp per family.
- 3) **Stockpile:** The table does not include stockpile as this is currently negligible. Only 1448 tents have entered Gaza in September so far (as of 15 September), following the blockade of aid since March.
- 4) **Pipeline does not guarantee meeting of needs:** It is uncertain whether large pipelines of all partners items recorded will be granted approvals and access. Refer to <u>SC dashboard</u> or contact Gaza SC Coordinators.

Modality of Assistance

At the time of writing these recommendations, market distortions, lack of supplies and difficulty in accessing cash make in-kind distributions advisable over Cash and Voucher Assistance. If partners are considering provision of cash of vouchers for shelter items or household items such as clothing, it is advisable to make a specific analysis before deciding on the most appropriate assistance modality and the evolution of markets and liquidity in Gaza needs to be closely monitored. Beyond household choice, voucher modalities when feasible and appropriate, can also contribute to sustaining local suppliers and service providers. Whatever assistance modality is chosen, the outcome of the activity should be to cover the identified winter needs and cash distribution cannot be considered an outcome. Refer to lessons learnt from winter clothing distributions in 2024-25.

Targeting and Prioritization of Winter Assistance

Shelter Cluster has developed <u>targeting and prioritization criteria</u>, which outlines geographical targeting and identification of sites and households for provision of assistance. This criterion is also applicable for winterization assistance. Currently with the ongoing large-scale displacement from north to south of Gaza, it is recommended to assist newly displaced households who have not been able to transport essential shelter and household items, followed by replenishing of shelter and household items for households with deteriorated materials. As no shelter items entered Gaza between March and September, most households across Gaza Strip face acute needs for emergency shelter and household items.

The different options and modalities of assistance should be discussed with the affected people and adapted, to the extent possible, to their cultural and social preferences. This is especially relevant for items such as the type of clothing or sleeping items. Targeting criteria should be communicated with households in coordination with SMC and AAP Working Group as applicable.

Activities

The winter activities continue to remain the same as winter of 2024-25. However, the focus will be on coverage of emergency shelter and essential household items.

Below are winterization activities we deem most appropriate, along with their prioritisation according to the relevant circumstances. However, it is essential that these activities be selected based on a thorough needs analysis and adapted to the specific context. Shelter Cluster has developed <u>technical specifications</u> for items.



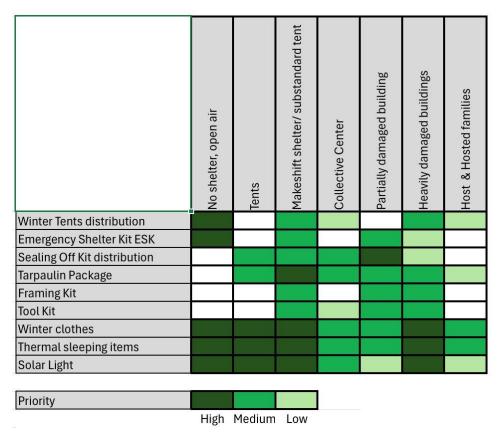


Table 2: Overview of winterization activities and prioritization

Winter Tents distribution	It is recommended that the distribution of tents during the winter period be accompanied by winterization elements such as an inner layer of fabric, a hole and an exhaust pipe for the stove, etc. Refer to minimum standards and guidelines on tents ⁶ and along the coastline face more exposure to wind and may receive an additional tarpaulin and technical assistance to improve shelters as far as possible.
Emergency Shelter Kit	Distribution of kits containing the necessary elements to build an emergency shelter, from structural elements to vertical and horizontal protections. In winter they must protect against wind, rain and ground moisture and be supplemented with the necessary winter NFIs. ESKs may also be used to seal off partially damaged buildings.
Sealing Off Kit; Tarpaulin Package	Distribution of SOKs (sealing off kits) or framing kits and tool kits ⁷ to adapt makeshift shelters for winter. Tarpaulins and ropes enhance waterproofing and wind resistance. They can also be used to insulate the ground and prevent water
Framing Kit	infiltration. The tools should be used to create drainage systems. Drainage
Toolkit	should be carried out collaboratively and in agreement with neighboring shelters to establish a network that channels water to an appropriate location, avoiding redirecting the problem to other shelters. Tools may also be used

⁶ Humanitarian tents consist of two layers with an air gap in between supporting weather protection; to improve adequate weather protection, supplement with winterization covering for tents (to be prioritized after coverage of tents has been achieved). The winter covering should correspond to type of tent.

⁷ Some partners have reported restrictions on bringing tool kits into Gaza. Refer to Cluster guidance on kit contents and distribution.



	alongside winterization IEC materials to anchor shelters and tie down roofs, protecting them from strong winds. If fuel heaters are used inside, chimneys must be installed to prevent fires and carbon monoxide poisoning.
Winter Clothes	Distribution of warm clothes and underwear. The objective of this activity is to provide beneficiaries with suitable garments to protect them from adverse weather conditions. For details on winter clothing procurement and distribution, refer to Shelter Cluster's lessons learnt from winter clothing distributions. Winter clothing should be prioritized for households living along the coastal areas of Gaza, as they are exposed to harsher winter conditions, and their shelters and belongings are at risk of being washed away by the sea.
Thermal Sleeping Items	As far as possible, it is recommended to provide complete bedding sets as per SC's assistance packages, for an average-sized family of six members. The kit contents are designed to mitigate GBV related issues and provide winter protection for a family of six members. It may not always be possible to bring in complete kits with access challenges, in which case partners can distribute smaller kits and it can be complemented in coordination with Cluster.
Solar Light	Solar lights are critical as Gaza has no electricity. In the winter months, the nights are longer, making solar lamps even more important to carry out domestic functions and to reduce protection risks. Shelter Cluster partners should provide at least one solar lamp per family with the possibility to charge phones and operate small appliances, such as fans ⁸ .

Additional activities

Emergency Repairs: Includes non-structural minimal upgrades such as sealing gaps in doors and windows, cracks in walls and roofs, restoration of services etc. Consider preparing a thermally sealed space for spending the night (safe space), as nighttime temperatures are typically the lowest.

Heaters and fuel⁹: Heaters are dual use items according to COGAT and no heaters have entered Gaza under the humanitarian response under Shelter Cluster so far. With no electricity, nor fuel such as cooking gas in the market, people resorted to coping mechanisms last winter, such as using clay ovens, metal stoves, or burning wood, cloth, and even trash to cook, and get warm. These coping mechanisms are not safe, nor sustainable as the price of wood has increased significantly. The shelter cluster continues to advocate for heaters and fuel. As a part of their winterization activities, shelter partners should raise awareness on safe heating and distribute IEC materials on fire risk mitigation (available

⁸ A solar lantern typically includes a solar panel, a rechargeable battery, and an LED lamp, all housed within a durable casing 5 USB outputs for charging phones, fans etc., light weight, small size, easy to carry, for indoor and outdoor usage, lamp luminous efficiency not less than 85 (lm/W), lamp luminous flux 5 lm, adjustable light output levels, warranty not less than 5 years, life span not less than 3000 hours, a good weight would be no more than 0.5 Kg, can be charged as well with battery capacity 4ah lead acid battery, USB output 1PS*5V,needs not more than 3-4 hours of direct sunlight per day for optimal charging, Light Distribution may offer a 360-degree omnidirectional light output or a specific beam angle.

⁹ The risk of fires increases during the winter months due to multiple factors. More activities are carried out inside the shelter, including cooking; electric or fuel heaters are used; more clothing and blankets are utilized, etc. It is essential to adhere to the technical specifications of the products used and to provide IEC materials for their correct usage and fire prevention. Fire risk assessments should be carried out and appropriate prevention and mitigation measures should be taken.



in English and Arabic). In addition, it is recommended to coordinate with SMC actors to communicate with communities on practical site-level measures to reduce fire risk. For example, advising allocating safe communal warmth points where possible, highlighting importance of ventilation and proximity of a fire point, even if limited in size, to reduce household use of unsafe stoves in tents.

Provision of sandbags: to be prioritized along the coast and in areas at risk of flooding. They may be useful only in areas with access to sand, and scale-up may not be possible in urbanized areas with no access to sand. Shelter cluster partners may provide this assistance under household-level site improvements and along with drainage works to mitigate flooding risk, by placing sandbags around the tents to prevent water from entering, residents especially elderly people—can benefit not only from improved protection against flooding but also from having a solid surface at the base of the tent to lean on, accompanied with <u>IEC materials</u>.

Sandbags are useful as temporary protection, but they must be accompanied by site drainage works and are not effective as stand-alone flood control. At the coastline, the mitigation will only be effective up to a certain extent as occupying the shore is unsafe (but people have no other options with severe congestion along the coast). Sandbags may also be used for fixing slopes of lands to maintain land stability. When providing such assistance on sites, coordinate with site management partners.

Timeline

Winterization assistance must be received in a timely manner when it is needed most. Although the various stages of planning, procurement, and distribution are generally arduous and time-consuming, the current situation in Gaza makes these timelines even more unpredictable

Under the ongoing blockade with limited access of shelter materials, partners are encouraged to continue advocacy efforts, and in parallel identify areas of supporting winterization efforts through local coping mechanisms like technical assistance for improving shelters, provision of IEC materials encouraging families to prepare for the approaching winter (Shelter Cluster is currently revising last year's IEC on protection from floods and rain).

In addition to essential components such as tents and bedding items, partners are encouraged to procure solar lights and sandbags to support winterization efforts. Logistical restrictions and uncertainties regarding supply and distribution lines necessitate advancing the procurement processes to ensure timely delivery.

Annex 1-References

Guidance documents and resources

A tip-sheet for things to consider by people planning temporary sites in Gaza

Targeting and prioritization guidance note

Technical guidance on tents assistance

Gaza population movement flash updates by SMC

Gaza Debris Management Working Group resources

IEC Materials

Protect your shelters from rain and flooding



Fire risk mitigation

Annex 2-Shelter Condition. Insulation ventilation and Heating

In addition to the housing type, we must assess its current condition, paying special attention to its waterproofing and insulating properties, its ventilation, and its ability to heat the space. Below are some parameters to consider. We have differentiated between shelters made with lightweight and temporary materials (tents and makeshift shelters) and those constructed with durable materials, although their conditions may not be optimal (housing and non-housing stock, damaged buildings, collective sites).

		Poor	Fair	Good
	Floor	The floor lacks thermator waterproof protection. It consists of compacted soil or sand. Carpets or mats may be used, but they do not cover the entire surface.	The floor has some type of continuous protection that prevents water infiltration (tarpaulin or plastic sheets in good condition). However, it does not have a continuous insulating layer. Carpets or mats may be used, but they do not cover the entire surface.	A continuous waterproof layer covers the ent surface and is raised at the perimeter to prevent infiltration from runoff water. A continuous insulating material prevents thermal leaks (carpet, wood, etc.).
insulation	Walls, doors & windows	The structure offers little resistance to wind or lacks a rigid framework. The enclosure is made of non-water resistant materials or materials not resistant to wind (cardboard, blankets, plastic sheets in poor condition).	The vertical walls are made of waterproof materials, however, they allow air to pass between their joints. The materials are starting to deteriorate and will have to be replaced in the medium term. It has openable doors and windows, but they do not close tightly.	The structure is rigid and resistant. The vertienclosures are waterproof on the outside an breathable on the inside (multiple layer). Materials are in good condition. The connection with the floor and roof enclosure continuous and prevents water and wind infiltration. The doors and windows close tightly.
	Cover	The structure offers little resistance to wind or lacks a rigid framework. The enclosure is made of non-water resistant materials or materials not resistant to wind (cardboard, blankets, plastic sheets in poor condition). Water seeps through the joints.	The structure is strong but not rigid and deforms in the wind. The materials are impermeable but pockets of water form, affecting stability and causing occasional leaks.	The cover is waterproof on the outside and breathable on the inside (multiple layer). Materials are in good condition. The structu is rigid and resistant. The connection with th vertical enclosure is continuous and preven water and wind infiltration.
Vent	tilation	There is no ventilation. It does not allow air circulation, the air is not refreshed, and it does not let smoke or steam escape (plastic sheets, tarpaulins, CGI sheets without openings).	Openings on only one side of the shelter. Opening into an enclosed or very narrow space (corridor, other shelter). Openings only in the lower part of the shelter. Openings are not protected and must remain closed in cold or rainy weather. Smoke vents are not ducted.	It has cross ventilation. The ventilation flow be adjusted according to needs. The openin are oriented towards open spaces allowing free air circulation. The openings are protec from rain and the penetration of insects and rodents. Smoke extraction is ducted and forced.
He	ating	No heating or cooking appliances or there is no suitable fuel/energy available.	Heaters or cookers that are energy-inefficient or that are not optimal for the available fuel type. Access to	The appliances are energy-efficient, or/and household has access to the appropriate ty
Ruildings (housing unit	s damaged houses non-residential stock collective sites	an insufficient amount of fuel.	and sufficient quantity of fuel.
Buildings (housing unit	s, damaged houses, non-residential stock, collective sites) Poorly insulated	an insufficient amount of fuel. Medium	and sufficient quantity of fuel. Well-insulated
Buildings (housing unit Floor			
Buildings (Poorly insulated The floor lacks thermal or waterproof protection, it consists of compacted soil, sand or uncovered concrete slab. Does not prevent moisture or infiltration. It lacks drainage, and water pools. Carpets or mats may be used,	Medium Continuous floor made of hard material (concrete, mortar, etc.). Possibility of dampness in certain seasons. No water infiltration. It does not have a continuous insulating layer. Carpets or mats may be	Well-insulated Hard surface, no moisture or infiltration. Smooth surface protected by flooring or
	Floor Walls,	Poorly insulated The floor lacks thermal or waterproof protection. It consists of compacted soil, sand or uncovered concrete slab. Does not prevent moisture or infiltration. It lacks drainage, and water pools. Carpets or mats may be used, but they do not cover the entire surface. The enclosures are incomplete or damaged, leaving large uncovered spaces. Enclosure gaps are covered with non- water-resistant materials or are not resistant to wind (cardboard, bankets, plastic sheets in poor condition).Doors or windows are missing or broken,	Medium Continuous floor made of hard material (concrete, mortar, etc.). Possibility of dampness in certain seasons. No water infiltration. It does not have a continuous insulating layer. Carpets or mats may be used, but they do not cover the entire surface. Continuous enclosure without holes or with small gaps or cracks covered with emergency materials such as tarpaulin, plastic sheets or fabrics. There are no water infiltration, but there is surface humidity. Thermal losses occur through cracks or openings It has openable doors and windows, but they do not	Well-Insulated Hard surface, no moisture or infiltration. Smooth surface protected by flooring or carpeting Materials are in good condition. There are r cracks allowing air or water passage. The di
insulation	Floor Walls, doors & windows	Poorty insulated The floor lacks thermal or waterproof protection. It consists of compacted soil, sand or uncovered concrete slab. Does not prevent moisture or infiltration. It tacks drainage, and water pools. Carpets or mats may be used, but they do not cover the entire surface. The enclosures are incomplete or damaged, teaving targe uncovered spaces. Enclosure gaps are covered with non- water-resistant materials or are not resistant to wind (cardboard, blankets, plastic sheets in poor condition). Doors or windows are missing or broken, teaving poorty covered gaps. The roof structure is damaged or absent, allowing water and wind to enter. The materials used to cover the gaps are non-water-resistant or are not resistant to wind (cardboard, blankets, plastic sheets in poor condition).	Medium Continuous floor made of hard material (concrete, mortar, etc.). Possibility of dampness in certain seasons. No water infiltration. It does not have a continuous insulating layer. Carpets or mats may be used, but they do not cover the entire surface. Continuous enclosure without holes or with small gaps or cracks covered with emergency materials such as tarpaulin, plastic sheets or fabrics. There are no water infiltration, but there is surface humidity. Thermal losses occur through cracks or openings It has openable doors and windows, but they do not close tightly. There are some cracks or the drainage system does not function properly, resulting in occasional located leaks. There is surface dampness. The roof lacks	Well-insulated Hard surface, no moisture or infiltration. Smooth surface protected by flooring or carpeting Materials are in good condition. There are to cracks allowing air or water passage. The diand windows close tightly. No cracks or water infiltration or moisture, thermal losses due to convection. The thickness or composition of the roof avoids.

The lowest level of insulation among the three parameters (floor, walls & joineries, and cover) will determine the overall insulation level of the shelter.