



The challenge of doing good: promotion of recycling in Almaty through civic community initiatives

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ABSTRACT

Recycling is one of the key components in reduction of carbon emissions and improving environmental conditions, especially in the urban context. In Central Asia, the legislation and infrastructure necessary for waste management is still under development. Thus, the knowledge gap and public awareness campaigns are mostly done at the grassroots level. This paper looks at the case of recycling promotion through civic community initiatives that also have a charitable component in Almaty. It explores the ethical considerations that are being entangled with the introduction of recycling culture in the city and is grounded in the literature on civil society, environmental ethics and social entrepreneurship. The data was collected through semi-structured interviews with organizers of recycling fairs and NGOs working on recycling. The paper reveals that by appealing to the ethical considerations of people to “do good” and contribute to charitable cause, the organizers of the recycling fair also demonstrate the effects of over-consumerism, ways of doing waste management, and educate about reuse and upcycle culture. The single case of Darmarka in Almaty present a limitation of the study. Therefore, a more in-depth research on the organisation of Darmarka events in other cities in Kazakhstan and CIS, as well as on similar initiatives in other Central Asian countries would be beneficial in the future. This is an important contribution in understanding what challenges and opportunities exist in promotion of recycling in Central Asia, that can be useful to national governments, experts, and international organizations working in this area.

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1. Introduction

Hip-hop music is blasting from the speakers, and a DJ in the corner is preparing to play the next tune. The stalls with products can be seen at the back of the room. It is a Saturday afternoon and there are plenty of people going around the space of the event. This is not just a usual fair aimed at selling local products and crafts. The path towards the stalls is lined with people in green T-shirt uniforms...and huge collecting bins. The volunteers collect 16 different materials for further recycling and re-use. This is Darmarka (a combination of *darit* [gifting] and *yarmarka* [fair]) a civic community initiative that aims to popularise recycling and waste management culture across Kazakhstan. At its core Darmarka addresses a crucial aspect of environmental campaigning in Kazakhstan, i.e., that a conscious waste management is key to improving the ecology in the urban settings and a primary aspect to raise awareness of individual behaviours and their impact on environment.

Darmarka is among several environmental initiatives that have started in the past few years in Central Asia. The effects of climate change are more acutely felt in Central Asia every year and the public is increasingly conscious about environmental problems in the region and globally (Sabyrbekov, Overland, & Vakulchuk, 2023). However, instead of focusing on campaigning and raising public awareness like many past environmental initiatives in the region, the new wave of organisations is pivoting towards civic community initiatives and even eco-entrepreneurship. In that way, environmentalism becomes a catalyst of ethical community work and ethical business rendering a wider community impact.

This paper investigates these themes through the case-study of Darmarka and other eco-projects in Almaty bringing together literatures on environmentalism, civil society, and ethical business and social entrepreneurship. The goal of the paper is to demonstrate how the current eco-initiatives are propagating waste management and utilising the sense of ‘doing good’ to benefit larger community. Therefore, these initiatives also bridge the gap between the lack of legislation and governmental programmes in the areas of waste management and upcycling. The paper starts by giving an overview of existing literature and introduce key concepts that will be in use throughout. It will then progress to describe the methodological framework and the case study of *Darmarka*, concluding with reflections on how such initiative brings together socio-economic issues with environmentalism and promotion of circular economy and a sustainable lifestyle.

2. Literature review

Climate change is a major concern for national governments in Central Asia. Thus, the governments are part of international and regional initiatives to alleviate the effects of climate change and signatories to several global pledges, such as the Paris Agreement, to give an example (Costa Buranelli, 2023). At a national level, the revision of environmental codes and strategies for environmental protection are implemented, often with the support from international organisations (Peyrouse, 2022). Despite these efforts the lack of public awareness about environmental issues is a concern and a challenge for the alleviation of effects of climate change (Peyrouse, 2022, p. 27). Limited education on ecology at school or university levels also affects the ability to raise public consciousness of issues like pollution, recycling, and general climate change basics.

With respect to waste management, it is important to understand national policies for it and what the governments are doing to tackle this issue. Waste management in Central Asia is one of the significant issues in environmental policies and is a multifaceted topic. Industrial waste creates significant environmental concerns for the whole region, and result in soil and water contamination that further impacts agriculture, livestock, and local eco systems (Peyrouse, 2022). Similarly, the common practice of bringing household waste into landfills located outside the urban centres results in the contamination of land, water, and air due to occasional fires. Air pollution is already a major environmental problem in the main cities across Central Asia, where concentration of harmful particles are exceeding by many times any average normal levels (Peyrouse, 2022, p. 8). Furthermore, the increase in urbanisation and continuous exponential growth of the household waste poses a major issue to the environment and natural habitat, unless dealt with appropriately. This is a common problem in Central Asia and something that the governments are struggling with. Thus, for example, in Kyrgyzstan the World Bank is supporting a program to modernise the waste management and landfill management around Bishkek (Tskhay, 2023).

In Kazakhstan, the government first initiated programmes of waste sorting by providing separate bins for paper, plastics, and general waste on the streets and collecting plastic bottles in Almaty. One of the issues in the collection of sorted waste is in fact its proper sorting, so that it can be then reused and recycled. In the absence of such proper waste recycling culture, the existing infrastructure remains idle, and businesses are required to buy the materials from abroad. Thus, while landfills in urban centres get more packed, the waste recycling centres are not utilised to the full capacity.

Waste management often refers to the stages of 3Rs - reduce, recycle, re-use. It is crucial to pay attention to this, for as we progress in this paper all these stages will appear. Thus, recycling refers to the process of transforming the waste into something else or degradable material. Re-use refers to the ability to utilise whole or parts of the waste into something else, for example using spare parts of electrical appliances or converting glass bottles into art objects. Upcycling is another notion that can signify this process. Reduction of waste refers to the conscious behavioural change to limit consumption, for example using reusable cups for coffee instead of a single-use plastic/paper ones.

Civil society has long been involved in environmental campaigning and promotion of safer ecology in Central Asia. Such major environmental problems as the Aral Sea protection, water management of transboundary rivers, and protection of natural habitat, have dedicated NGOs and international networks (Farmer & Farmer, 2001). Several recent studies reflect on the development of environmental movements, eco-activism, and environmental behaviour in Kazakhstan. In their study Kuzembayeva et al. (2017) argue that before 1985 it was almost impossible to start any initiatives due to the Soviet political regime (Kuzembayeva et al., 2017, p. 95). Even though later there were some prominent movements that gained international attention and actually caused significant changes like the “Nevada-Semipalatinsk” movement against nuclear activity, authors suggest that because of the economic crisis, attention of the population and the government was given to the economy, not ecology (Kuzembayeva et al., 2017, pp. 95-96).

A growing literature on environmental movements also draws on the tensions between government and civil society and the challenges of environmental campaigning (O’Connor, 2022). This follows an established line of enquiry on the operation of civil society in authoritarian context in Central Asia (Adibayeva, Saari, & Utarbayeva, 2023; Buxton, 2009; Knox & Sharipova, 2024; Peyrouse, 2022). The political aspect of civil society activities in the region are given more attention by scholars. Thus, for example Adibayeva et al. (2023) studied environmental initiatives through the prism of political movements, and focused on conservation, protests, and sustainable development campaigns. Adibayeva et al. (2023) mention several campaigns that they consider as successful in raising environmental awareness in Kazakhstan such as “Green Activist”, “Green Academy”, “The Altyn Dala Conservation Initiative”, “Zhasyl Kazakhstan”, “Eco-Damu”, “Tazalyk”, The Green Economy Financing Facility for Kazakhstan (GEFF). Moreover, in their study on the Kok-Zhailau case (a part of a national park near Almaty that is facing extreme pollution and is argued to become a ski resort), the authors have demonstrated how through years of campaigning and negotiations with both private and public bodies, the eco-activists were successful to secure the preservation of Kok-Zhailau (Adibayeva et al., 2023,

p. 22). It is important to note that, as Kumar (2022) states, the participation in eco-movements is limited due to prevailing concern about economic issues that occupy more the general public in Kazakhstan.

The focus on waste management is not done by chance, as numerous studies have shown a grim situation with recycling. One study uses national statistics on waste management in Kazakhstan, where the authors found that only 2.6% of all waste in Kazakhstan is municipal waste (which is mostly household waste), whereas waste from mining industry and electricity and gas industries accounts to 68% and 15% correspondingly (Serikova, Baidakov, & Syrlybayeva, 2020, p. 2). According to them, in 2018 about 25% of the municipal waste was transferred to third-party organizations/waste recycling plants, and this number is increasing each year from 2015 to 2018 (Serikova et al., 2020, pp. 3-4). However, out of this 25% only 4.8% is reported to be recycled. The authors suggest three solutions for this problem: “control over the application of laws in the waste management field, change people’s ecological behaviour, and the availability of a secondary resources market” (Serikova et al., 2020, p. 6).

Review of the current literature on the topic revealed that previous studies do not address ethical considerations of the population of Kazakhstan in the context of eco-activism. In other words, reasons for environmental movements and civil engagement are not being analysed from the perspective of ecological ethics (Elegbede, Sanni, Mekuleyi, & Afolabi, 2023; Palmer, McShane, & Sandler, 2014). Especially, as the later part of this article will present, the new wave of eco-initiatives is utilising the charitable aspect together with commercial activities in promoting a more sustainable lifestyle and instillation of eco-friendly behaviour.

It is helpful to look at literature and global examples of social entrepreneurship and civil society initiatives in the area of sustainability and environmentalism. Definition of social enterprises includes the alignment of commercial profit with social impact, where that impact can be described as “achieving its social mission that will help alleviate societal problems and produce environmental benefits” (Kamaludin, Xavier, Amin, & Xavier, 2024, p. 31; Santos, Pache, & Birkholz, 2015, p. 39). For Austin, Stevenson and Wei-Skillern (2006) social entrepreneurship is linked to use of business opportunities for the “creation of social value for meeting the basic and long-term needs of society” (Groma & Licite-Kurbe, 2021, p. 233). These two definitions represent a general pattern in the discussions about social entrepreneurship and point at the business activity and acumen directed at creating social value and long-term social impact. It is the social entrepreneurs that fill the market gap in addressing the social needs, and the ability of being closer to the community level allows them to make a greater impact. The flexibility, creativity,

and social awareness paired with business models are the qualities that position social entrepreneurs to achieving results (Kamaludin et al., 2024, p. 29).

Another important factor in the operation of social entrepreneurs is their mission (Austin et al., 2006). The guiding principles and mission help social entrepreneurs to focus on social impact and perform in a more targeted manner. Relying on extensive networks and by mobilising resources, social entrepreneurs can grow and learn, thus being more agile and proactive in their approach and activities than established corporations and/or governments (Kamaludin et al., 2024, p. 29). In fact, it is acknowledged in the literature that social entrepreneurs are filling that gap left by government institutions (Hill, Kothari, & Shea, 2010).

To summarise the above presented discussion indicates that climate change and environmental issues do have an impact and concern local population in Kazakhstan. This is also shown in the operation of multitude of environmental campaigns and projects. Yet, the present paper aims to move beyond the study of environmental civil society and campaigns, and utilise the concept of social entrepreneurs in application to the new wave of initiatives that promote circular economy and sustainable lifestyle. This further contributes to the study of the topic on environment and sustainability in the urban context in Central Asia, as well as the impact and development of grassroots movements.

3. Methodology and data collection

The paper takes a case study as a research strategy to explore the connection between recycling promotion and social entrepreneurship on the example of *Darmarka* - a civic community initiative in Almaty. The case study methodology allows to present an in-depth analysis of a phenomena within its natural setting and to utilise multiple data collection methods (Priya, 2021). Therefore, the example of *Darmarka* was selected specifically to explore the way civic community initiative develops and how its organisers connect it to environmentalism and waste recycling culture. This exploratory case study of *Darmarka* project is designed to bring fresh view on the impact of civic community initiatives and social entrepreneurship in Central Asia and, thus, to foster new research studies in this area.

As the paper attempts to explore the notion of social entrepreneurship and sustainability promotion in the region, the methodological design was constructed to fit such purpose. The data collection for this article was done through a mix of participant observation, interview, and social media posts review methods conducted over the period of two months in 2023 and 2024. Participant observation happened on December 9, 2023 when the *Darmarka* event was organised in one of the exhibition halls in Almaty. The organisers of the event were notified in advance of

my observation, with minimum intervention on behalf of the author. The observation was necessary to take notes of performativity, and interactions between visitors, volunteers, entrepreneurs, and organisers. An in-person conversation with organisers of *Darmarka* was held during the event. In addition, two structured interviews with *Darmarka* organiser and community projects partnering with *Darmarka* were conducted online through fixed set of questions that addressed the main themes, discussed later in this article. A small sample of interviewees and the structured nature of questions allowed the authors to build a narrative of evolution and logic behind civic community initiatives as a foundation for a larger and longitudinal study in the future of this phenomena, which is deemed suitable in social science research (Crouch & McKenzie, 2006). The respondents answered question at their own pace and were not interrupted in order to preserve a “story-telling” nature of the conversation. Below is a set of questions presented to interviewees:

1. Tell us about how you founded your company/initiative. How did the idea come about? What were you motivated by?
2. What are your goals for this project? What principles do you use to guide your project?
3. Tell us about cooperation with other organizations. How do joint projects begin?
4. What plans and dreams do you have for the future?
5. What results are you proud of and why?
6. What difficulties have you encountered and continue to experience in your project?
7. Describe in your own words the social awareness of the population about ecology and recycling issues?
8. Do you think your project is contributing to changing people's recycling habits and zero-waste lifestyle?
9. Why is the social aspect of the project, especially the charitable aspect, important to you?

A review of social media posts and videos from *Darmarka* social media profiles on Instagram was also conducted to gather some information and see the engagement of the internet audience, as well as how organisers are promoting their events and values in the digital space.

As this is an exploratory case study, the methodological framework was designed to capture the main details of the *Darmarka* evolution and its links with waste recycling promotion. Moreover, the fact that this is not a longitudinal study, it only gives a glimpse on the main attributes and achievements in the time the study was conducted. The limitation of this study due to the length of data collection and number of respondent interactions is obviously reflected in the number of inferences

that this paper presents. Hence, a further longer fieldwork with participation in multiple events would be needed to capture change and continuity and especially to capture the influence on people's behaviour from participation in *Darmarka* events over time.

4. Data analysis

To understand the path that *Darmarka*, as an initiative went through, it is crucial to understand its origins. *Darmarka* is a civic community project with a motto “Вторая жизнь вещей” (“second life of clothes”). The idea of *Darmarka* is not new and there were already existing initiatives like, clothes swap or garage sale. However, the goal of such initiatives was to expand the lifespan of items and provide a platform for clothes and goods exchange, whereas *Darmarka* wanted to go beyond that. The format of *Darmarka* together with its name was brought to Kazakhstan by Russian eco-activist and trainer Roman Sablin, whose goal is to spread the knowledge about sustainability and connect like-minded eco-community. The first *Darmarka* event was organised in December 2017.

Darmarka started as a small community event and eventually grew to monthly eco-action project, where people can bring their unwanted items, recycle, and buy eco-products, as well as learn and gain knowledge, and exchange opinions with like-minded people, therefore, have a sense of belonging to a larger community. It is important to note that the *Darmarka* project is a non-commercial activity that does not gain profit and is supported through sponsorships and volunteer work. Most of the promotion for the event and the project itself is achieved through social media channels like Facebook and Instagram.

A distinctive point that sets apart *Darmarka* from other environmental projects is its charity component. The merging of clothes swap and support to people in need is an innovative way to “do good” and promote a more sustainable lifestyle.

“Through collaborations with other initiatives, civil society, and eco-projects, we find like-minded people, and learn about their needs. Therefore, we, for example, can purposefully collect items for pet shelters or provide clothes to low-income families affected by floods in other regions of Kazakhstan.” (quote from *Darmarka* organisers) Such flexible approach and ability to provide help and address social needs is directly linked to the social entrepreneurs ability to act as change agents (Lehtimäki, Sengupta, Piispanen, & Henttonen, 2021, p. 175). In this respect, there is a combination of social and economic issues together with the support for a circular economy (Lehtimäki et al., 2021, p. 175).

The focus on local actions and the work on that scale is explained due to limited resources and human capital. However, such concentration on a local community

level, also is supported by the literature that acknowledges the role of social entrepreneurs or as Lehtimäki et. al (2021, p. 172) calls them ‘social bricoleurs’, are needed to address local needs and act as change agents.

One of the aspects of social entrepreneurship is value creation, either at a product or societal levels (Hlady-Rispal & Servantie, 2018). In the case of *Darmarka*, the ethical component is at the heart of the project, and the ability to help people is a guiding principle of the social projects that are partnering with *Darmarka*.

“The project is also aimed at future generations, the fact that we can live a better planet for the next generation. The awareness that one individual can make a difference and inspire others to follow and be mindful of the environmental impact we are living to the next generation.” (quote from *Darmarka* organisers)

This is a common sentiment among the environmentalists that focus on the moral responsibility to care for the planet for the sake of future generations.

One of the main challenges for the operation of such projects as *Darmarka* is a lack of stable funding. Similarly, other social entrepreneurs that execute non-commercial projects share this challenge. Access to funds to support operations, staff salary, and ability to grow, is critical for building a sustainable project. Thus, the lack of support from government or other commercial organisations creates a challenging environment to operate.

Another challenge connected to the previous one, is staff retaining and increasing human capital. Reliance on volunteer work has its advantages and disadvantages. Yet, for a sustainable activity one needs project manager, social media managers, stakeholder engagement managers, which also requires stable office space and meetings scheduling.

Lack of infrastructure in Kazakhstan for waste recycling is an obstacle for many to get involved in it. The necessity to recycle household waste in multiple locations of recycling centres creates an inconvenience for local population, and thus, many are not motivated to sort and recycle their waste, as was discussed previously in this paper. The fact that *Darmarka* events can provide a platform for recycling or different types of household waste at the same place is of great advantage. Moreover, the collected waste also saves time to producers and craftsmen for then reusing it for their purposes rather than them collecting it by themselves.

In the discussion with the organisers of *Darmarka* about their goals and mission, they said the following. “The main goal is to raise awareness about over-consumption, especially pertaining to textile industry and its environmental impact. This is achieved through two stages. At first, a person collects the unwanted items of clothing to bring to *Darmarka* and in this process reflecting on his/her individual consumer choices and habits. People notably bring new or rarely used items, which demonstrates unsustainable consumption patterns. Secondly, while being at the

event, people see how much stuff is brought and the sheer volume of unwanted items, and hence reflect on the overall consumption habits in society. These two trigger points have an immense effect on people.” In their study Sarbassov et al. (2019, p. 12) highlighted the fact that active citizenship position and high degree of environmental awareness were one of the two most rated motivations for waste recycling among respondents.

On the basis of the quotes shared by the *Darmarka*'s organizers, one can argue that there are three functions in relation to waste management that *Darmarka* organizers fulfil: raising awareness, waste collection, support of local craftsmen and demonstration of upcycling opportunities. First, information sharing through social media and onsite campaigns serve as a primary aspect of changing people's behaviour. By demonstrating what, how, and how easy it can be to recycle materials, the organizers present the public with a clear message that anyone can (and should) recycle.

Second, the actual collection of waste that cannot be recycled through other means simplifies the act of recycling. The single location recycling also facilitates the likelihood of people bringing goods for recycling, rather than spending time on traveling to different spots.

Third, the presence of craftsmen and local businesses that use upcycling techniques presents a direct visual experience of how waste can be transformed and utilized in a different manner, and by extension reducing the overall pollution in urban landfills.

As the Instagram post from the *Darmarka* profile states the last event on March 17, 2024, the organisers managed to collect 1,775 kilograms of household waste (paper, carton, plastic of different types, aluminium cans, tins, glass, batteries, electric waste, expired medicines, and mercury-containing items). More than 1,500 kilograms of clothes were collected and then sent to people in need in the village of Qaraoi in Ile region. 182 used books were sent through the partner community project to the prison libraries. The visitors of the event had an opportunity to buy products from 16 different eco-businesses. These numbers represent not only the volumes of unwanted items that people brought to the event. More importantly, however, these items that could have ended up in the landfill were transferred to those in need and thus contributing to the circular economy and charitable causes.

My participant observation revealed the interesting example of families that come with kids to *Darmarka*. Children collect and sort their unwanted toys and consciously want for their toys to bring joy to other kids, as well as enjoying a possibility to choose a new toy for themselves. Thus, there is a generational learning component of importance of helping others and being conscious of consumption habits. This phenomenon is discussed largely in the literature as intergenerational ethics and

is particularly being applied in the discussion of climate change and environmental preservation (Nolt, 2017). Moreover, through the presence of programs of transferring unwanted items of clothing, books, vinyl, and others, at *Darmarka* events to those in need, a charitable component of the event, it relates to the ethical components of environmentalism, such as compassion, altruism, respect, appreciation, and value that are discussed by scholars (De Groot, Drenthen, & De Groot, 2011; Palmer et al., 2014; Sandler, 2017).

The above-mentioned findings can be supplemented by the results of the several studies which looked at local residents' behaviour in waste recycling in the urban context in Kazakhstan. Thus, for example, the study by Sarbassov et al. (2019) analysed environmental behaviour through surveys of around 3,000 people living in Astana. Both had some similar findings. Zhidebekkyzy et al. (2023) found out that one third of respondents sort their waste in two categories, while results of the survey by Sarbassov et al. (2019) showed that around 24% of respondents sort their household waste. Both studies revealed that environmental behaviour depends on gender and on the place of residence, where females tend to "sort more" than males, and residents of big cities tend to have a higher level of waste sorting than those from the suburban areas (Zhidebekkyzy et al., 2023; Sarbassov et al., 2019). However, the two groups of authors have differences: for Zhidebekkyzy et al. (2023), environmental behaviour also depends on the level of education, whereas for Sarbassov et al. (2019) a crucial component is age, with older people tending to be more active. Furthermore, the local residents themselves are not aware on the process of waste recycling, as was demonstrated by the study conducted by Zhidebekkyzy et al. (2023, p. 48) and that indicates a huge knowledge gap in this area.

This gap is, however, partially covered by other authors. In one study by Sarbassov et al. (2019), most of the respondents (61%) said that their motivation for active participation in waste sorting activity was active citizenship, while the most demotivating factors were lack of facilities for waste collection (47%) and lack of effective public awareness campaigns (31%). In another study, the reasons for the lack of environmental awareness were stated to be lack of environmental education and government passivity (Kumar, 2022). Furthermore, Adibayeva et al. (2023) note that there is lack of specific government policies and funding to support development in the field of eco-activism as well as low level of civic engagement in the implementation of eco-projects.

By promoting *Darmarka* days as eco-action and an event that goes beyond just waste sorting, through lectures on sustainability, crafts workshops, and craftsmen and eco-products fair, the organisers appeal to a wider audience. Thus, the goal is that more people would join *Darmarka* not for waste sorting, but by participating in

it they will be more motivating to bring the waste for the next eco-action. Therefore, a process of socialisation is at play and a peer-to-peer learning. Cooperation with local government also plays a role in the organisation of the eco-events and is used to have a win-win effect. There is a learning aspect, where government officials learn about the recycling and eco-projects and the needs of the community and local entrepreneurs, and the organisers receive the support for logistical issues of event management.

5. Regional implications

There are wider regional implications from initiatives like *Darmarka* in popularising waste management and sustainable behaviours. First of all, *Darmarka* events are held in other Central Asian cities and across Kazakhstan. This is an indication of the spread of the project and its potential impact beyond the capital cities. The first *Darmarka* event in Tashkent was organised on 23 December 2019 by an environmental community project called Hashar week (Shulepina, 2019). The fair dedicated to the swap of clothing, books, and toys was the first attempt to instil a sense of reducing the waste and extending the lifecycle of items. Similar events now occur on a regular basis in Tashkent and provide clothing and other household items to vulnerable groups. The American University's Centre for Civic Engagement organises eco-events in Bishkek and raises awareness about sustainability and climate change (AUCA, 2024). They also organised *Darmarka* event as part of their Eco-Day project with the clothes being donated to an orphanage at the end.

The fact that *Darmarka* events are picked up across Central Asian region is an indication in the change of the societal awareness of the issues pertaining to climate change and sustainable lifestyle. It is important to indicate that these events are not stand-alone initiatives but rather part of a larger projects that focus on promotion of sustainable behaviour, like Hashar week (Tskhay, 2023). Thus, Hashar week project regularly organises collection of household waste, such as paper, plastics, and metals, and public lectures to raise awareness on the benefits of and ways for recycling¹. The existence of Tazar mobile application, which helps connect citizens with recycling points and educates them on how to recycle household waste in Bishkek, allows to further promote sustainable lifestyle behaviour (Trevor, 2021).

As *Darmarka* events in Central Asia are yet at the nascent stage and still require time and opportunity to grow. The challenge of upscaling these events in the region inevitably is linked to financial and human capacity limitations. In order to host regular events and extra activities such as public lectures and masterclasses to further promote the educational component of the *Darmarka* activities, a steady

¹ For more details on the events organized by Hashar week, please refer to their Instagram profile page.

flow of funding and personnel is necessary. At the same time, the grass-root nature of these initiatives indicate a way of raising public awareness about waste recycling and upcycling, thus, having a direct point of influence on societal behaviour. Fabienne Bossuyt (2023) believes that the initiatives operating at a local community level have tremendous potential for implementation of climate resilience and adaptation practices, therefore improving environmental situation in the region. She especially focuses on the self-reliance aspect of community initiatives to curb the inefficiencies and restrictions of national governments.

6. Conclusion

This paper delved into the issue of recycling and waste management in Almaty, and the promotion of recycling culture through civic community initiatives. The case of *Darmarka* represents an example of social entrepreneurial campaign that aims at bringing social change and using creative and innovative ways for addressing societal needs, as well as creating opportunities for local initiatives and businesses.

Darmarka achieves a three-pronged outcome through the organisation of the community event in Almaty. It collects and sorts for further reuse and recycle household waste, raises public awareness through lectures and by encouraging for further recycling, and supports eco-entrepreneurs and the use of local and ecological products. This distinguishes this initiative from the government institutions and allows it to achieve results that would not be possible to be accomplished at the public policy level. *Darmarka* and its organisers directly identify and respond to social needs, communicate with local public, and instil recycling behaviour through socialisation. All of these would be hard for the government institutions to achieve due to their bureaucratic nature and concern with national policies.

Studies on social entrepreneurs and their impact, especially in promoting environmental causes in Central Asia, are given small attention in the literature (Tskhay, 2023). The growth of similar start-ups and community initiatives that bring together businesses and civil society are indicative of a cultural shift and more creative and innovative ways of campaigning. Therefore, a comparative and an in-depth study on the proliferation of social entrepreneurs in the region would expand our understanding of these actors, and their societal role.

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