## Briefing paper for Cllr Tom Miller, Lead Member for Stronger Communities

#### Use of Sky Lanterns and Helium Balloons on Brent Council Land

#### 1. The Issue

- 1.1 The council has received a request to prohibit the launching of sky (Chinese) lanterns on council land. We have in the past received some complaints from residents about the use of these articles but not enough to warrant a policy.
- 1.2 Twenty five local authorities have banned the use of lanterns from their land. The only London Boroughs on the list are Redbridge and Wandsworth.

## 2. What are sky lanterns?

- 2.1 Sky lanterns are small hot air balloons made of paper, with an opening at the bottom where a small fire is suspended on a base framework containing an ignition source. They are intended to be launched into free flight, rising by the enclosed hot air. Sky lanterns are widely-available via the internet. They are also supplied through individual retailers, ranging from event and party suppliers to budget 'pound' stores and similar outlets. They tend to be sold in multiple packs, rather than single units
- 2.2 Sky lanterns are known by a variety of names, including: Sky lanterns, Chinese lanterns (fàng tiān dēng (放天燈 or 放天灯)), Fire lanterns, Thai lanterns, Kong Ming, Khoom Fay, Khom Loi, Wish lantern, Chinese Flying Lanterns, Thai Sky Lanterns, Wedding Lanterns, Flying lanterns, Floating Lanterns, Paper lanterns, Japanese paper lanterns, Sky candles, Glow lantern, Chinese flying glowing lantern and Paper hot air balloons.

#### 3. Helium balloons

- 3.1 Helium balloons are used at individual parties and events, for business purposes (e.g. Product advertising), and by charities raising awareness or funds. The UK has an established market for helium balloons and the industry is well represented by member-based associations that respond to issues and lobby on behalf of members.
- 3.2 Helium balloons are sold by a range of retailers, from large high street chain stores to individual 'party planners' who provide balloons as part of their overall service. There are a number of other businesses that rely (at least in part) on the helium balloon sector for a portion of their revenue. These include suppliers of helium ('balloon') gas and companies that print designs onto balloons.
- 3.3 The key industry bodies (see Section 3.3) are however consistent in their requirement that all helium balloons intended for release should be manufactured from 100% natural latex since this is claimed to biodegrade more rapidly than non-latex equivalents. The industry bodies are also consistent in their requirement that foil balloons should not be released, because of the long term littering and environmental impacts of the foil material.

# 4. Problems caused by Sky lanterns

- 4.1 According to the UK Maritime and Coastguard Agency, there have been 1679 incidents attributed to Sky lanterns since 2007. In addition, they have given rise to a number of safety concerns including:
  - (a) Risks to livestock and animal health (including marine animals)

    Anecdotal reports and media coverage suggest widespread concern from farming groups and others over the impacts of sky lanterns on the health and welfare of livestock and horses. However, the evidence reviewed by the project team indicates

that the number of cases reported each year of animals affected through panic and fright and of ingestion of sky lantern debris is very small.

#### (b) Fire risk and damage to crops and property

Incidents in which sky lanterns were said to be directly implicated in starting fires have been reported by a variety of sources, including the Chief Fire Officers Association. A huge fire involving 100,000 tonnes of plastic recycling material, thought to have been sparked by a Chinese lantern, produced a 6,000ft smoke plume and is said to have caused £6 million damage to the Jayplas waste depot in Greater Birmingham.

(c) Impact on the environment, including littering on land and at sea
On the basis of the evidence presented, the project team concluded that the
contribution of sky lantern debris to overall environmental littering is small and less
significant than potential fire risks and risks to aviation.

## (d) Risks to aviation

Sky lanterns pose a safety risk to aviation due to possible ingestion into engines when airborne. The Civil Aviation Authority has provided quantifiable evidence to the study in the form of Mandatory Occurrence Reports. A total of 48 of these were reported to be due to sky lanterns and helium balloons between 2001 and 2012.

## 5. Problems caused by Helium Balloons

5.1 The risks from helium balloons are considered to be from manoeuvring aircraft to avoid concentrations of these objects; ingestion into an engine is considered to be unlikely to cause damage. The CAA maintain that the risks from sky lanterns and helium balloons, although small, should be taken into account when making an assessment for any release.

## (a) Risk to coastal rescue services

No evidence has been found of any adverse impacts of helium balloons on coastal rescue services.

**(b) Risk to consumer safety.** There is very little evidence to link either sky lanterns or helium balloons with risks to consumer safety at present. This is in marked contrast to the well-documented consumer safety risks associated with fireworks.

#### 6. Helium resources

- 6.1 Helium is a finite resource which is used in a variety of medical, scientific and industrial applications. One of the main medical applications is in MRI scanners, although the largest consumer of helium is reported to be NASA who use it in 'huge quantities to purge potentially explosive fuel from its rockets. The depletion of helium reserves will pose risks to its future use in MRI scanners, for example.
- 6.2 It is estimated that the use of helium resources for filling party balloons constituted up to 10% of global helium consumption in 2009 (Wothers, Royal Institute Christmas lectures, 2012). There have been calls for party balloons to use hydrogen, rather than helium. Whilst hydrogen is cheaper and more buoyant, helium is preferred because it is non-flammable and therefore safer. In response to these concerns, the balloon industry has recently insisted that the helium used in party or toy balloons is recycled gas previously used in the medical industry and subsequently mixed.

## 7. Market size, value and numbers employed

(a) Sky lanterns - £6 million to £16 million

## (b) Helium balloons

- Market value £150 million
- Numbers employed 21,750

#### 8. Legislation and Guidance

- 8.1 Government currently does not have plans to ban the use of sky lanterns. However Defra intends to work alongside sky lantern manufacturers to introduce clearer danger warnings on packaging and work with retailers and manufacturers to publish improved consumer guidance about how to use the lanterns responsibly. In England and Wales, any controls are currently voluntary, as existing legislation does not prohibit the deployment of sky lanterns or helium balloons. Worcester City Council impose a FPN and a fine of £70 for 'littering'. The local paper has branded the Council as "killjoys".
- 8.2 Under current legislation as set out in the Clean Neighbourhoods and Environment Act 2005 and Environmental Protection Act 1990, waste from balloons and or sky lanterns is not classified as litter and as such no specific action can be taken. However the Council would have the authority to determine the required conduct of people using its land and therefore can enforce the prohibition of mass balloon and lantern releases if it adopted a policy on the subject.
- 8.3 The Civil Aviation Authority requires written application for the release of more than 5000 balloons at any one time, at least 28 days in advance of the release. The Industry has produced a Code which is intended as guidance on good practice for those designing, manufacturing, distributing, retailing or using sky lanterns. The code is approved by the Chartered Trading Standards Institute.
- 8.4 It is an offence to place on the market or supply any product which is not a safe product. Distributors have a duty to report any information about safety risks they are aware of in respect of their products and to co-operate with enforcement authorities.

#### 9. Conclusions

9.1 Defra commissioned a study to identify and assess the risks associated with sky lanterns and helium balloons and to establish an evidence base to help inform future policy decisions. There is very little evidence to link either sky lanterns or helium balloons with risks to consumer safety at present. This is in marked contrast to the well-documented consumer safety risks associated with fireworks

## (a) Sky Lanterns

- (i) The evidence reviewed by the project team indicates that the number of cases reported each year of animals affected through panic and fright and of ingestion of sky lantern debris is very small.
- (ii) Fire risks from sky lanterns are mainly to agricultural crops, buildings and moorland. Incidents in which sky lanterns were said to be directly implicated in starting fires have been reported to the project team from a variety of sources, including the Chief Fire Officers Association. These incidents have the potential to cause significant disruption, loss of property and risk to human and animal life; therefore fire risk associated with the use of sky lanterns is significant.
- (iii) The contribution of sky lantern debris to overall environmental littering is small and less significant than potential risks of fire risks, to aviation and coastal rescue services. However, the localised effects of littering can be large e.g. in the vicinity of an event location or if large numbers of lanterns are released simultaneously from a single point.

(iv) Sky lanterns pose a safety risk to aviation due to possible ingestion into engines when airborne. Whilst aircraft are on the ground, sky lantern debris can pose a risk to taxiing aircraft and cause delays to take-off and landing.

#### (b) Helium Balloons

- (i) The main concern regarding helium balloons is in relation to ingestion by animals. There may again be a significant level of under-reporting, but the current evidence indicates that the impact is very small and confined to only a small number of isolated incidents. Any harm to marine life often goes unseen, given the inaccessibility of habitats, and this is difficult to overcome
- (ii) Recent surveys (e.g. from 'Beachwatch') have enabled evidence to be collected in relation to helium balloons and from these the project team has concluded that litter is only of minor significance.
- (iii) The risk to aviation from helium balloons is due to aircraft manoeuvring to avoid them. Mass release of balloons poses a potential problem but industry codes of conduct stipulate the need for compliance with CAA guidelines. No information was presented to the project team to suggest that additional control measures are needed.

#### 10. Recommended Action

- 10.1 That you advise if a draft policy on the use of sky lanterns and helium balloons on Brent Council land should be produced for consideration by Cabinet. A suggested draft policy, similar to one adopted by Worcester City Council, is attached.
- 10.2 That you advise which Service should take the lead on this subject, including the enforcement of any policy.

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## Suggested Draft Sky Lantern and Helium Balloon Release Policy 2018

#### 1. Introduction

- Outdoor balloon and sky lantern releases have become a traditional and common event at summer fairs, fundraising events, opening of new stores, or part of commemorative occasions; but few people are aware of what happens once they are released and the potentially harmful consequences for wildlife and property that can occur as a result of this form of celebration.
- 1.2 The Marine Conservation Society, an internationally recognised charity for the protection of seas, shores and wildlife, has produced a Pollution Policy & Position statement on Balloons and Sky Lanterns, asking UK Local Authorities to recognise balloons and sky lanterns as a form of littering and to ban all outdoor releases. This stance is actively supported by the RSPCA and National Farmers Union.

## 2. Aim

2.1 The aim of this policy is to classify the intentional outdoor release of balloons and sky lanterns ("lanterns") as an act of littering, to discourage such activities in Brent and to prohibit releases from Brent Council owned land.

## 3. Scope

- 3.1 This policy covers the release of balloons and lanterns within Brent Council and the Council's position in respect of the release of balloons/lanterns from Brent Council owned land.
- 3.2 This policy covers all different types of balloon and lantern materials. The main types of balloon are latex (rubber) and foil (also known as mylar). Latex balloons, whilst biodegradable, may still persist in the environment for up to four years. Lanterns typically contain a metal frame. For the avoidance of doubt, piloted hot air balloons are not covered by this policy.

#### 4. Policy

- 4.1 The Council prohibits the release of balloons/lanterns from Council owned land and buildings. This applies to Council run events and events run by third parties.
- 4.2 The Council considers the release of balloons and lanterns from any land or buildings as littering and will take action under the Environmental Protection Act 1990 and the Clean Neighbourhoods and Environment Act 2005 where appropriate.

#### 5. Litter

5.1 Where balloons and lanterns are released intentionally outdoors and are not disposed of responsibly, they litter the environment and as such this could be considered to be an offence under the Environmental Protection Act 1990 and the Clean Neighbourhoods and Environment Act 2005. Where the Council receives evidence of littering through the release of balloon and lanterns which are not disposed of responsibly, the Council will consider exercising its powers under the above legislation.

## 6. Permitted /responsible releases.

6.1 Helium balloons may also be used for research purposes, for example weather balloons, as long as supporting evidence is provided, identifying any risk and/or

hazard to the environment and with appropriate mitigation.

## 7. Working with event organisers

7.1 Once the Council is notified of potential releases within the Borough, the Council will work with event organisers to suggest suitable alternatives to outdoor balloon and lantern releases and/or to provide advice and guidance on the disposal of balloons and/or lanterns.

## 8. Monitoring, Assessment & Review

- 8.1 The Council will inform event organisers of the Balloon and Sky Lantern Release Policy by means of including relevant information within booking forms and other appropriate promotional materials.
- 8.2 This Policy will be reviewed bi-annually.