

## **SOUTH CAMBRIDGESHIRE DISTRICT COUNCIL**

---

REPORT TO: Climate Change Working Group

9 September 2010

AUTHOR/S: Executive Director (Operational Services) / Corporate Manager (Planning and New Communities)

---

### **RAMPTON DRIFT DEMONSTRATOR PROJECT**

#### **Purpose**

1. At the last meeting of the Working Group, Members were made aware of the significance and urgency in delivery of the Rampton Drift Demonstrator Project (a domestic energy conservation, efficiency and microgeneration retrofit project aiming to demonstrate the benefits and recorded outcomes of a varying range of such measures across a collection of volunteer households in Rampton Drift within the perimeter of the proposed Northstowe new town development. Setting an example in terms of both tailored physical installations and behaviour change amongst the occupants as a pre-cursor to the eventual build-out of Northstowe and its 'eco-town' credentials).
2. The purpose of this paper is to:
  - (a) appraise Members of the latest information regarding the grant award for the project, a summary of recent changes to the funding and delivery mechanism, and the next steps to move the project plan forward.
  - (b) promote deliberation as to the most effective role for the Working Group, as an expert member reference body in the development, monitoring and evaluation of the project proposals and outcomes, with a view to establishing a small informal Working Group sub-team that can work with the portfolio holder, officers and Rampton Drift residents in progressing the effective delivery of the project. The sub-team would report back to the full Working Group at its formal meeting as required.
3. This is not a key decision because such decision-making is not within the remit of the Climate Change Working Group.

#### **Recommendations and Reasons**

4. That the Members of the Working Group:
  - (a) note the current status of the project;
  - (b) agree on how best to help the project move forward and contribute to its delivery, monitoring and evaluation, and;
  - (c) establish a small Working Group sub-team to work on providing this assistance in between the formally scheduled Working Group meetings.

#### **Background**

5. In March the Department of Communities and Local Government (CLG) awarded a £365,000 revenue grant to fund a co-ordinated set of eco-town 'gap' studies and a capital grant of £1.135m for an Eco-Town Demonstrator Project focussing on low-carbon lifestyles. The capital project consisted of two elements:
  - (a) A retrofit demonstrator scheme for homes in the existing community of Rampton Drift

- (b) An exhibition and learning facility at the Longstanton Park & Ride site.

### **Considerations**

6. In July, it was announced that the original grant would be reduced. The amount allocated for the studies was reduced to £182,500 and the amount for the demonstrator project was reduced to £567,500, giving a total award of £750,000. The date for substantial completion of both projects was to remain as the end of March 2011.
7. The reduced grant award causes issues for delivery of the demonstrator project and studies in terms of both timescale and financial viability. Work is currently being undertaken to review the need and benefit of the eco-town 'gap' studies, with the aim of reducing the monies required to be spent on these. This exercise is due to be complete by the Northstowe Delivery Board meeting on 14 September, and involves consultation with the Joint Promoters. Subject to CLG approval, this process could allow grant not required for the studies to be transferred to the demonstrator projects. At present officers are re-working the Rampton Drift retro-fit project to fit a budget of £320K.
8. Confirmation of the award is subject to the approval of an option appraisal. This is due to be submitted in September. At the same time, CLG will be asked to allow the projects to be delivered over a period of 11 months, in order to particularly meet the requirements of the County Council regarding delivery of the exhibition and visitor centre. Such a revised timescale will also assist the Rampton Drift project.
9. At a meeting for residents of Rampton Drift in May, residents asked that the grant be used to improve their homes rather than purchasing and improving two that were for sale at the time. In view of the wishes of the local community and the reduction in grant, the programme of works has been amended as described below.

### **The Works Proposed**

10. The work programme has been amended to allow substantial improvements to be made to 10-15 homes within a budget of £320K. It is proposed that each property taking part in the scheme will be individually assessed and a proposal developed which is suited to the needs of the property and matched to the homeowner's lifestyle requirements. To facilitate this a menu of works will be established and used to help each homeowner to appraise the options most suited for inclusion in the work to their property (re. Appendix 1).
11. A key aim of the project has always been to identify the costs, effects and benefits of carrying out the refurbishment of the existing houses already within the boundaries of the proposed Eco-town and to encourage and enable the residents to enhance their own properties to reduce energy usage and carbon emissions.
12. The fundamental requirement to achieve reductions in CO<sub>2</sub> emissions is a highly insulated building fabric, combined with excellent dwelling airtightness and an efficient heating system. To reduce emissions further, heat and/or electricity may be generated through the use of micro-generation.
13. All the properties involved in the project will be enhanced to achieve a base level of environmental performance by carrying out the following works where they are necessary and appropriate:
  - (a) Provision of adequate insulation within the roof space

- (b) Provision of cavity wall insulation if appropriate
  - (c) Provision of other forms of insulation to the external walls
  - (d) Draught proofing
14. Additional work will be carried out to install a combination of systems appropriate to each house selected from the following list:
- (a) New insulated floor with provision for under floor heating and new floor finishes
  - (b) Replacement of windows and external doors with high performance triple glazed windows and high performance doors
  - (c) Alterations to roofing to accommodate provision of solar heated hot water systems and/or solar photovoltaic panels for the generation of electricity
  - (d) Minor modifications to lighting & taps
  - (e) Addition of atrium to provide passive heating
  - (f) Installation of ground source heat pump
  - (g) Installation of air source heat pump
  - (h) Installation of new combination boilers
  - (i) Provision of mechanical ventilation and heat recovery system
  - (j) Installation of equipment to allow the performance of the home to be monitored.
15. Ongoing Monitoring of energy use and home performance will be an important part of the programme. Officers are exploring methods of doing this, including collaboration with Anglia Ruskin University. The collection and analysis of reliable energy usage and carbon emissions data will be essential if we are to establish the most cost effective and efficient ways of improving the existing housing stock. Energy meters and monitoring equipment will be installed as part of the work on each property renovated no matter what the extent or value of the work under taken.

### Implications

16	Financial	No grant means no project in the present form but would result in the need to find other ways of meeting the project aims.
	Legal	Agreement required regarding CLG grant, and regarding works to individual householder's homes
	Staffing	Project to be delivered within existing staff resources
	Risk Management	Risks will be identified, managed and safe guarded against by the range of agreements made and the contracts placed for the works.
	Equal Opportunities	The project plan will allow every eligible resident of Rampton Drift to apply to take part - provided by the proposed project plan
	Climate Change	The whole aim of the project is to reduce energy consumption and carbon emissions in the existing housing stock

### Consultations

17. Cambridgeshire Horizons, Cambridgeshire County Council, Go East, Renewables East, the Portfolio Holder for Northstowe and Officers of South Cambridgeshire District Council

## **Conclusions / Summary**

- 18 The reduction in the grant available now means that earlier proposals to buy and renovate two properties and spend the remaining funds on other properties is no longer viable. The revised proposal detailed above achieves the original main project aim of enhancing the environmental performance of as many of the existing homes in Rampton Drift as possible in line with the Eco-town aspirations for Northstowe while developing the knowledge, skills and experience to apply the new technology required to upgrade the existing housing stock.
- 19 Working with the Homeowners it is proposed to refurbish a number of properties (probably about 10-15 if there is a good take-up) to achieve a minimum base level of insulation and energy performance and adding additional features, fittings and equipment from a menu of options available including the installation of alternative forms of micro generation as applicable to the particular home as an example of what can be done to transform the existing housing stock to reduce energy use and carbon emissions.
- 20 It is intended that the Homeowners will be asked to enter into an agreement with the Local Authority which will confirm what is to be done, the costs and any contributions to be made by the homeowner and to include their agreement to issues such as pre-installation base-lining, the provision of 'a diary' and post-installation monitoring alongside an agreement to the whole behaviour-change agenda which will be necessary to obtain the best results from the investment and which will be necessary to reduce the energy usage, save the greatest amount of carbon and bring about the most positive long term changes.
- 21 The homeowners will be also asked to sign up to an agreed programme of 'open house' access and publicity of their experiences (e.g. public open days, on-line video tours, diaries etc.) to ensure that the importance of the work done and the benefits obtained are shared with the wider community. The strong body of knowledge that has been developed by the District Council and its parish partners through the South Cambs Sustainable Parish Energy Partnership over the past 18 months will prove an invaluable aid to this process. Consideration has been given to whether any restrictions/repayment provisions should apply in the event of an improved property being sold prior to the end of a specified monitoring period. There is concern that any such arrangement may affect the number of those willing to sign up to the scheme and unless the matter were to involve potentially cumbersome legal procedures there is also a question as to the likely success and delivery of any restrictions/repayment provisions.

### **Background Papers:**

The following background papers were used in the preparation of this report:  
Northstowe Portfolio Holder's Meeting held on Thursday, 11 March 2010  
Minutes of a meeting of the Cabinet held on Thursday, 13 May 2010  
Minutes of a meeting of the Council held on Thursday, 27 May 2010  
Northstowe Portfolio Holder's Meeting Wednesday, 9 June

### **Contact Officer:**

John King – Community Technical Manager / Richard Hales – Team Leader  
Sustainable Communities and Principal Lead for Environmental Sustainability and  
Climate Change  
Telephone: (01954) 712901 / (01954) 713135