

Dublin and Mid East
Regional Authorities

**SEA of the Review of
the RPGs for the
Greater Dublin Area
2010 - 2022**

SEA Statement

ISSUE 1

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Regional Authorities

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the RPGs for the
Greater Dublin Area
2010 - 2022**

SEA Statement

November 2010

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Executive Summary

This document forms part of the Strategic Environmental Assessment (SEA) for the Review of Regional Planning Guidelines (RPGs) for the Greater Dublin Area 2010-2022. This is the SEA Statement as required under the European Communities Regulations 2004. This Statement has been written in accordance with the requirements of Directive 2001/42/EC of the European Parliament and of the Council of the 27th June 2001 on the assessment of the effects of certain plans and programmes on the environment. It is the final stage of the SEA Process.

The purpose of the SEA Statement is to provide information on the decision-making process and to document how environmental considerations, the views of consultees and recommendations arising from the Environmental Report have been taken into account in the adopted review of the Regional Planning Guidelines.

An introduction to the SEA process and a statement on the SEA process is provided in Chapter 1.

The review of the SEA methodology is provided in Chapter 2.

Chapter 3 provides a review of the scoping carried out during the SEA process and the development of the RPGs.

In Chapter 4 a summary of the environmental assessment undertaken of the RPGs is provided and describes the iterative matrix lead approach adopted during this assessment.

A final appraisal of the SEA Process is detailed in Chapter 5, and describes the team interaction, the assessment effectiveness and the concluding environmental assessment.

1 INTRODUCTION

1.1 The Purpose of an SEA Statement

This document forms part of the Strategic Environmental Assessment for the Review of Regional Planning Guidelines for the Greater Dublin Area 2010-2022. This is the SEA Statement as required under the European Communities Regulations 2004. It is the final stage of the SEA Process.

The purpose of the SEA Statement is to provide information on the decision-making process and to document how environmental considerations, the views of consultees and recommendations arising from the Environmental Report have been taken into account in the adopted review of the Regional Planning Guidelines. The four key requirements of this SEA statement are to highlight:

- The incorporation of Environmental Considerations
- Stakeholder Involvement
- Alternatives Considered; and
- Monitoring

These key areas are identified in text boxes throughout this report to ensure greater transparency and that the requirements of the SEA Statement are being met.

The SEA Statement is chronological in nature and includes the following information:

- An outline of the SEA methodology.
- The scoping process - Including a summary of how the SEA Report and the submissions received from stakeholders have been taken into account.
- Environmental Assessment - Including a summary of how environmental considerations have been integrated into the plan or programme.
- The Appraisal Process - Including the reasons for choosing the plan or programme adopted, in the light of the other reasonable alternatives considered.
- Measures adopted to monitor the programme going forward.

The SEA statement must be made available to the public to accompany the adopted RPGs

1.2 Statement on the RPG SEA Process

The Regional Planning Guidelines for the Greater Dublin Area covers the geographic area of Dublin City, Dun Laoghaire-Rathdown, Fingal, South Dublin, Kildare, Meath and Wicklow and incorporates the regions of both the Dublin Regional Authority and the Mid-East Regional Authority. The guidelines provide a strategic planning framework for the long-term sustainable development of the area for the 12 year period up to 2022. The guidelines will be reviewed again in 2016.

The RPGs aims to direct the future growth of the Greater Dublin Area over the medium to long term and works to implement the framework set out in the National Spatial Strategy (NSS). The RPGs informs and directs City and County Development Plans for each of the Councils in the Greater Dublin Area. Given the strategic nature of this policy document, the Strategic Environmental Assessment must be appropriate to the scale of the plan, and therefore the assessment undertaken is strategic in nature.

The assessment process was primarily qualitative in nature, with some aspects based on expert judgement. This qualitative assessment compared the likely impacts against the Strategic Environmental Objectives to see which RPG Policy and Recommendations meet the Strategic Environmental Objectives and which, if any, contradict these.

The overall assessment process was iterative in nature. A matrix system was developed to facilitate the assessment process. Matrices of the RPG strategies against strategies, and strategies and policies versus the key environmental objectives were developed and revised iteratively in conjunction with the development of the RPGs. Each time a revision of wording of the RPGs was considered, the Environmental Team would consider each and adjust the assessment as required and provide input to the RPG team regarding mitigation that could be incorporated into the RPGs to ensure sustainability and reduce or remove potential environmental impacts to the GDA. This iterative process is outlined in greater depth in Section 4 below.

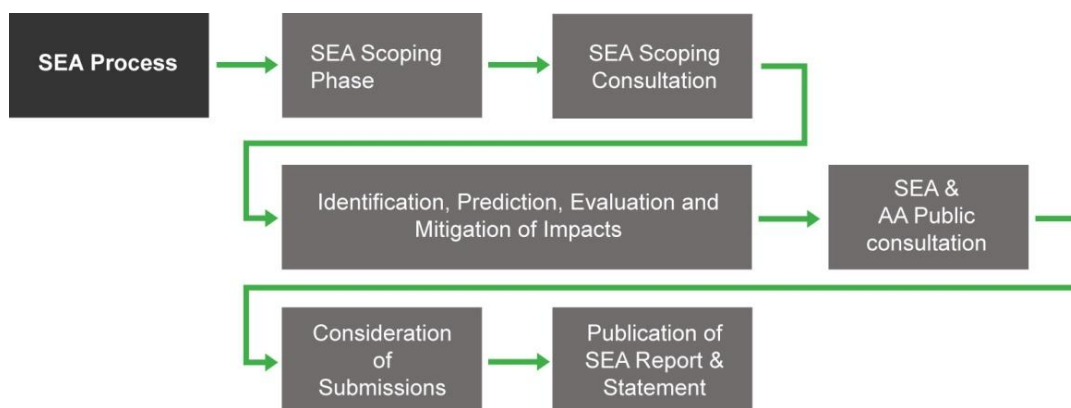
2 SEA METHODOLOGY

2.1 Introduction

This section highlights how the SEA of the RPG has been undertaken in line with the SEA Directive and domestic legislation. The SEA has been undertaken in an iterative manner, with preliminary assessment results being discussed with the GDA so that policy mitigation can be incorporated, where necessary, at the earliest possible stage.

The SEA methodology for the RPG review is based on legislative requirements and DoEHLG¹ / EPA² guidance and will ensure compliance with the SEA Directive and associated legislation. The level of detail of the SEA will be appropriate to the high-level nature of the RPGs. The RPGs are a high level document and thus they are prescriptive at a strategic scale and ensure protection, maintenance and enhancement of the regions environment through carefully worded strategic level policies and recommendations.

The following key stages have been identified:



The methodology used for this assessment is described below.

2.2 Screening

Screening is usually required for plans and programmes that may have significant impacts on the environment, though the potential impacts are not immediately clear. The screening process allows the responsible authority to identify at the earliest possible opportunity whether the development of the proposed plan or programme requires SEA, in order for the assessment to be factored in to the development plan process.

The development of RPG will always require SEA as a mandatory measure due to the requirements of the SEA Regulations, so screening was not a necessary part of this SEA process.

2.3 Scoping

The scoping phase of the SEA is a key part of the assessment process as it establishes the range of environmental issues to be covered and the level of detail the assessment will investigate.

¹ Department of the Environment, Heritage and Local Government (2004). Implementation of SEA Directive (2001/42/EC): Assessment of the Effects of Certain Plans and Programmes on the Environment. Guidelines for Regional Authorities and Planning Authorities.

² Scott, P & Marsden, P (2003). Development of Strategic Environmental Assessment (SEA) Methodologies for Plans and Programmes in Ireland (2001-DS-EEP-2/5) Synthesis Report Prepared for the Environmental Protection Agency by ERM Environmental Resources Management Ireland Limited

Stakeholder Involvement

The Scoping Process allows input from the environmental authorities and relevant stakeholders to be incorporated at an early stage of the SEA.

Essentially any issues/comments submitted as part of the scoping process provided greater focus on the development of the following aspects of the RPG Review and SEA;

- Determined the key elements of the RPGs to be assessed;
- Determined the environmental issues to be assessed;
- Collected and reported on relevant international, national and local plans, objectives and environmental standards that may influence or impact on the RPGs;
- Developed draft environmental objectives, indicators and targets to allow the evaluation of impacts; and
- Identified reasonable alternative means of achieving the strategic goals of the RPGs.

A scoping report for this SEA was published in February 2009, which asked key questions of statutory consultees and key stakeholders.

2.4 Baseline Data

Gathering suitable information relating to the state of the environment for a plan area is an integral part of the SEA process. The SEA Directive requires that certain information relating to the relevant environmental baseline is presented in order to help test the performance of the plan's implementation, as well as helping establish how the environment would change if the plan were not to implemented.

Baseline information has been collected from readily available sources, supplemented with a Geographical Information System (GIS) to graphically present relevant information. The baseline information for the GDA area is reported in Section 3 of the Environmental Report.

2.5 Environmental Assessment of the draft RPGs

The Environmental Assessment process ran in parallel to the RPG review and development process. The following stages were included in the timeframe for the review of the RPGs and the associated SEA process;

1. Preparation of Issues Paper;
2. 1st Public Consultation on Issues Paper;
3. Report on 1st Public Consultation;
4. Preparation of draft RPGs and SEA;
5. Draft for Public Display finalised;
6. 2nd Public Consultation on draft RPGs and SEA;
7. Report on 2nd Public Consultation;
8. Finalisation and translation of RPGs;
9. Publication of RPGs and SEA.

An environmental appraisal matrix was developed which facilitated the assessment of RPG strategies and policies against key environmental objectives. The joint matrix lead assessment basis of the SEA carried out by SEA and RPG teams provided a holistic, integrated and iterative approach to the formation of the RPG strategies and policies. To this effect the processes of SEA and Guidelines development were effectively seamless.

An environmental appraisal matrix was developed which facilitated the assessment of RPG strategies and policies against key environmental objectives. The joint matrix lead assessment basis of the SEA carried out by SEA and RPG teams provided a holistic, integrated and iterative approach to the formation of the RPG strategies and policies. To this effect the processes of SEA and Guidelines development were effectively seamless.

The environmental assessment process was undertaken in accordance with best practice SEA principles and guidance. This included desk reviews of all of the available GIS data, specialist investigation into the likely impacts associated with the RPG strategic policies and recommendations against the stated environmental objectives. Iterative discussions between the RPG Development Team, Environmental Team and Habitats Directive Team took place concurrently with this process. A suite of environmental assessment workshops were conducted with all three teams as well as with the EPA. More information on the assessment workshops is reported in Section 5 of the Environmental Report and Section 4 of this SEA Statement.

2.6 Consideration of Alternatives

The SEA Directive requires that reasonable alternatives be assessed in order to demonstrate how the preferred strategy performs against other forms of action. Alternatives must be developed, described and assessed within the SEA process, with the results presented in the Environmental Report.

Consideration of Alternatives

Alternatives must be developed, described and assessed within the SEA process, with the results presented in the Environmental Report.

Section 6 of this Environmental Report highlights the development of the alternatives to RPG preferred strategy and how they performed against the SEA framework.

2.7 Consultation

The Scoping Document was released during the first stage of public consultation, and as outlined a number of comments were received from various interest groups which the assessment process incorporated.

Consultation was undertaken with the EPA regarding the methodology, structure and focus of the SEA. The aim was to produce a workable document that can be utilised throughout the lifetime of the RPGs and which will further influence the development of further regional plans and their associated SEAs.

A second consultation process took place looking for feedback on the draft RPGs and draft Environmental Report. Ongoing discussion and meetings with Technical Steering Group, senior representatives of each Local Authority as well as presentation to the local authority elected representatives. A summary of consultation responses are listed in Appendix A

2.8 Environmental Assessment of the final RPGs

Subsequent to the public consultation process of the draft RPGs and its associated Environmental Report, the RPGs were updated to reflect input from the public, statutory and non-statutory bodies and local representatives. The Environmental Team and the RPG Team worked together on this, continuing the iterative process. Each time a revision of wording of the RPGs was considered, the Environmental Team would consider each and adjust the assessment as required. Input would then be provided to the RPG team regarding mitigation that could be incorporated into the RPGs to ensure sustainability and reduce or remove potential environmental impacts to the GDA.

The final assessment matrix is outlined in Appendix G.

2.9 Technical Difficulties

The availability of information for incorporation into the GIS database was either inconsistent or not up to date across the region. Some national information was also not available for use. Consequently, the environmental baseline and the sensitivity mapping are based on the obtainable information.

The following difficulties and data gaps were encountered over the course of the compilation of the baseline and this assessment:

- Poor boundaries / administrative overlap for some data sets;
- Lack of quantitative data to same degree of detail for topic areas;
- Some information not compiled by the relevant agencies (e.g. biodiversity plans, cultural heritage plans and landscape characterisation plans);
- Lack of digitised data in some topic areas (e.g. landscape);
- Quantitative assessment made very difficult due to the very strategic level of the strategic recommendations proposed for incorporation in the RPGs.

In future iterations of the RPGs it should be considered, as these guidelines direct the sustainable development of regions and the linkages between them, that access to environmental data from all sources should be granted to the Regional Authority for the purposes of establishing an environmental baseline to the most accurate level possible. This will allow for the most robust strategic assessment possible.

3 SCOPING

3.1 Scoping Process

The SEA scoping phase was a key part of the assessment process as it established the range of environmental issues to be covered and the level of detail the assessment would investigate. The Scoping Process facilitated input from the environmental authorities and relevant stakeholders to be incorporated at an early stage of the SEA.

The scoping report for this SEA was published in February 2009. It set out the scope of the Strategic Environmental Assessment and Habitats Directive Assessment and provided information to allow consultation with defined statutory bodies on the scope and level of detail to be considered in the assessment.

The report outlined that the environmental baseline would cover the following aspects:

- Biodiversity;
- Population and Human Health;
- Soils and Geology;
- Water Resources;
- Coastal and Marine Environment;
- Air and Climate;
- Cultural Heritage including Architectural and Archaeological Heritage;
- Landscape;
- Material Assets.

The report summarised the key environmental issues relating to the draft Plan and outlined relevant plans and programmes which were likely to affect, or be affected by the draft Plan.

This information was then used to set out a series of draft SEA objectives, indicators and associated targets. The objectives and targets established aims and thresholds which would be taken into consideration to effectively assess the impact of the draft Plan on the environment. Indicators were used to track the achievements of objectives and targets, describe the baseline situation, monitor the impact of the draft Plan on the environment and predict impacts.

In order to obtain input from relevant stakeholders, the following key questions were put forward within the relevant sections of the document to facilitate structured responses:

- Are there any other relevant International, national or regional plans or programmes that should be considered?
- Given the regional nature of the RPGs, are there any other significant environmental issues or information sources that should be considered?
- Are there any environmental issues that should be scoped out at this stage?
- Do you have any comments regarding the draft SEA environmental objectives, targets or indicators?

Stakeholder Involvement

A range of submissions were received in response to the scoping report which were incorporated into the environmental assessment process. A summary of the responses received on the scoping report are presented in Appendix A1.

Essentially any issues/comments submitted as part of the scoping process provided greater focus on the environmental issues in the development of the RPG's.

3.2 The SEA Path Forward

At this point in the project, it was the environmental teams' intention that the development of the SEA and RPGs would be an iterative process with the Habitats Impact Assessment team, RPG team and with input from the EPA. This iterative/staged process was implemented and the process is outlined in detail in Section 4.3 below.

The joint matrix lead assessment basis of the SEA carried out by SEA and RPG teams provided a holistic, integrated and iterative approach to the formation of the RPG strategies and policies. To this effect the processes of SEA and Guidelines development were seamless.

The iterative nature of the process ensured that policies and recommendations considered were changed where necessary to accommodate mitigation of environmental impacts.

4 ENVIRONMENTAL ASSESSMENT

4.1 Environmental Baseline Establishment

The assessment of the proposed RPGs against the current Environmental Baseline is the principal task of the SEA process. The baseline description was cognisant of the regional nature of the RPGs and the pressures and interrelationships between environmental topics. This baseline description facilitated the following;

- A description of the current physical environment in the GDA with particular reference to those aspects of the environment which are experiencing plan-related problems at present, or are likely to be significantly affected by implementation of the plan;
- A do nothing scenario – an estimate of how current environmental conditions would change over time without implementation of the plan;
- Identified the current state of the environment, against which the likely effects of implementing the plan was assessed. The measure of the impact can be estimated as the difference in environmental conditions with and without implementation of the plan.

The Environmental Baseline provided an overview of the existing conditions within the GDA of the following environmental topics;

- Biodiversity, Flora and Fauna;
- Population and Human Health;
- Soils and Geology;
- Water Resources;
- Flooding;
- Air and Climate;
- Cultural Heritage including Archaeological and Architectural Heritage;
- Landscape
- Material Assets.

The inter-relationship between the SEA environmental topics was taken into account. Of particular note is the interrelationship between water (quality and quantity) and biodiversity, flora and fauna, soils, human health and population. Flora and fauna is dependent on the hydrological environment (surface water and groundwater) as a habitat but the terrestrial environment also relies on these resources. Water quality is also of particular importance with regard to human health as it provides a source of drinking water and its influence on agriculture and mariculture. Water is also used for leisure and recreational purposes, providing a material asset both for local populations and as an integral component of the tourism economy.

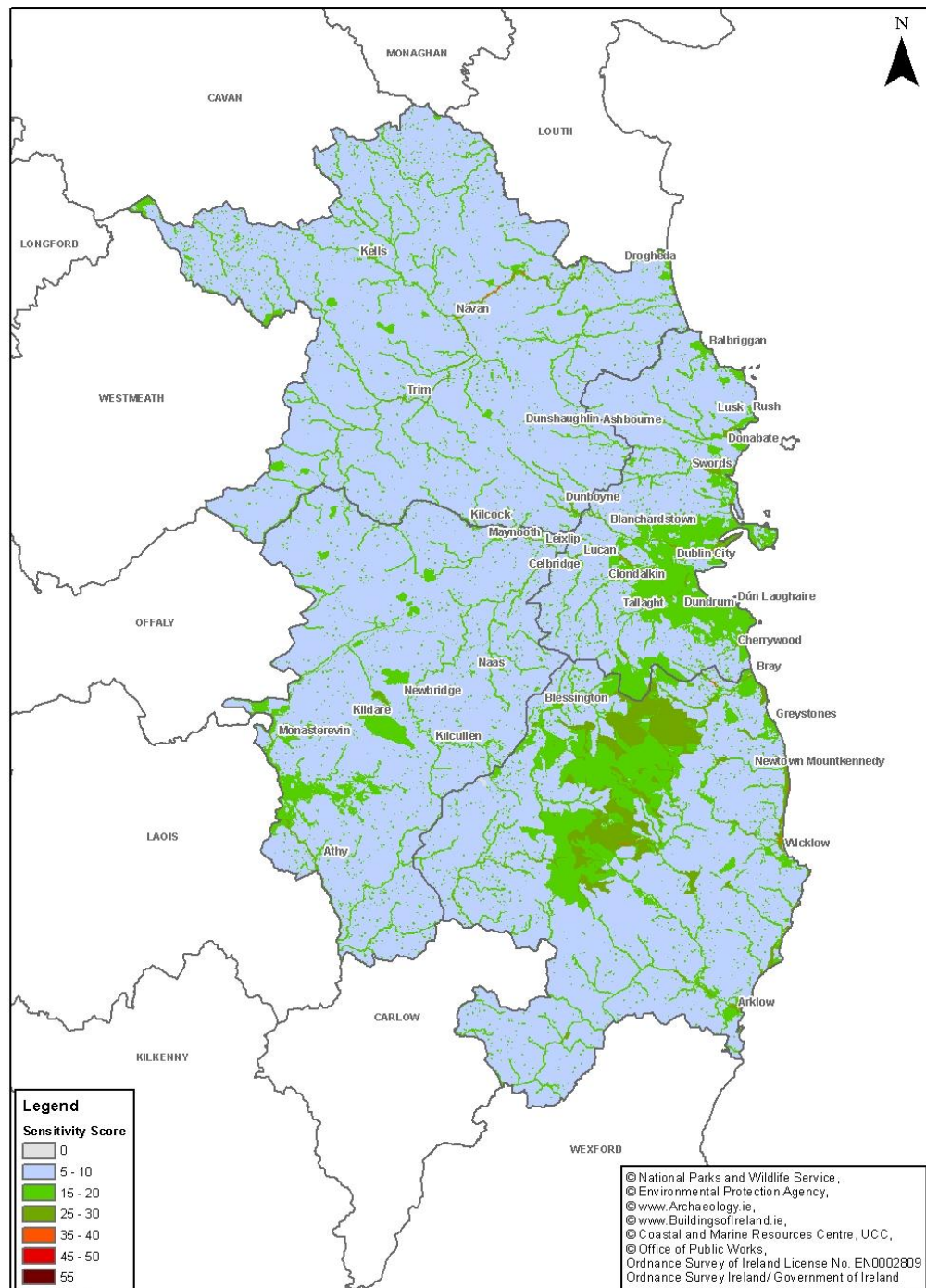
The use of GIS was central to the development of the environmental baseline.

Incorporating Environmental Considerations

Spatial data relevant to nine environmental baseline headings were obtained from 19 different sources which included: Environmental Protection Agency (EPA), National Parks and Wildlife Service (NPWS), Central Statistics Office (CSO), Department of Agriculture Fisheries and Food (DAFF), the 7 Local Authorities within the greater Dublin area, Geological Survey Ireland (GSI) and the Eastern River Basin District.

On receipt of the data baseline maps were created which assisted in documenting the current environmental baseline. Arising from the baseline maps an environmental sensitivity map was created to determine the most environmentally sensitive features of the GDA. This allowed for the determination of potential environmental impacts. Figure 1 illustrates the GDA environmentally sensitive areas.

NTS Figure 1 GDA Environmental Sensitivity Map



A detailed description of the sensitivity mapping is outlined in Section 3.14 of the Environmental Report.

4.1.1 Interactions/Interrelationships

The interactions and interrelationships between the SEA environmental baseline topics was an important consideration for the environmental assessment. Table 1 below outlines the key identifiable interrelationships arising in this SEA. These potential interrelationships are taken into account throughout the assessment process. While all environmental topics interact with each other to some extent only the significant relationships on a regional level were considered. Direct relationships are highlighted in red while indirect relationships are highlighted in blue.

Table 1: Key Interrelationships between Environmental Topics

	Biodiversity	Population & Human Health	Soils & Geology	Water Resources	Flooding	Air Quality & Climate	Cultural Heritage	Landscape	Material Assets
Biodiversity		Blue	Blue	Red	Blue	Blue	White	Blue	White
Population & Human Health	Blue		Red	Red	Red	Red	Red	Red	Red
Soils & Geology	Blue	Red		Blue	Blue	Blue	White	Red	Red
Water Resources	Red	Red	Blue		Red	Red	White	Red	Red
Flooding	Blue	Red	Blue	Red		White	Blue	Red	Red
Air Quality & Climate	Blue	Red	Blue	Red	White		White	White	Red
Cultural Heritage	White	Red	Blue	White	Blue	White		Red	White
Landscape	Blue	Red	Red	Red	Red	White	Red		Red
Material Assets	White	Red	Red	Red	Red	Red	White	Red	

4.2 Objectives, Indicators and Targets

The formation of the environmental objectives required cognisance of the environmental protection objectives established at a range of levels through the legislation and guidelines. Global, EU and national level legislation, policy and associated environmental objectives were utilised to develop the environmental objectives for the GDA. The objectives outlined below are also placed in the context of and linked into the development of the RPG draft policies and recommendations to ensure that the objectives are appropriate for the GDA.

The environmental objectives for the RPGs are outlined below;

Biodiversity, Flora and Fauna

Conserve the diversity of habitats and species while improving access for the appreciation and promotion of wildlife.

Population and Human Health

Improve people's quality of life based on high-quality residential, working and recreational environments and on sustainable travel patterns.

Soils and Geology

Safeguard soil and geological quality and quantity.

Water Resources and Flooding

Improve water quality, the management of all waters and coastal resources to comply with the standards of the Water Framework Directive and incorporate the objectives of the Floods Directive into sustainable planning and development.

Air Quality and Climate

Maintain and promote continuing improvement in air quality through the reduction of emissions and promotion of renewable energy and energy efficiency.

Cultural Heritage including Archaeological and Architectural Heritage

Promote the protection and conservation of the cultural, including architectural and archaeological, heritage through the sustainable integration of development with its surroundings in a coherent fashion to enhance the context into which it is placed.

Landscape

Conserve and enhance valued natural, developed and historic landscapes and features within them.

Material Assets

Make best use of existing infrastructure and promote the sustainable development of new infrastructure.

Incorporating Environmental Considerations

The environmental objectives are linked to appropriate targets and indicators outlined in section 4 of the Environmental Report.

The objectives were key in the assessment process. Each strategic policy and strategic recommendation was assessed against each objective.

This assessment process is described in greater depth in the sections below.

4.3 Assessment Stage 1 – Initial Draft RPGs

The approach used for assessing the RPG Policies and Recommendations was an objective led assessment and was primarily qualitative. The first iteration of the appraisal matrix was completed by the SEA team independently of the RPG Team. It facilitated the development of the first appraisal matrix which then formed the basis of further iterative assessments.

This assessment compared the likely impacts against the Strategic Environmental Objectives to see which RPG Policies and Recommendations meet the Strategic Environmental Objectives and which, if any, contradict these. Particular reference was made to the potential for cumulative effects in association with other relevant plans and programmes within the GDA area.

Particular regard was paid to the need for the sustainable development of the GDAs ecological resources (including the conservation of fish and other species of fauna and flora, habitats and the biodiversity of inland and marine water ecosystems and commercial and natural fisheries) as economic resources. In conjunction with the Habitats Directive

Assessment due consideration was given to potential significant impacts of the RPG policies and recommendations on ecological resources for the following areas:

- Surface and Ground Water quality;
- Surface water hydrology;
- Fish spawning and nursery areas;
- Passage of migratory fish;
- Areas of natural heritage importance including geological heritage sites;
- Designated marine protected areas;
- Biological Diversity;
- Ecosystem structure and functioning;
- Seabirds and marine mammals;
- Fish and shellfish cultivation;
- Sport and commercial fishing and angling;
- Amenity and recreational areas;
- Mineral and aggregate resources;
- Sediment transport and coastal erosion;
- Navigation;
- Other legitimate use of the sea.

The assessment process categorised environmental impacts using the ratings outlined in table 2 below, based in the impact assessment criteria defined by the EPA for environmental impact assessment. While synergistic impacts are also included in the EPA assessment guidelines, giving the significant crossover and interaction between certain environmental topics, it was considered that there is the potential for all impacts to be synergistic across the GDA and consequently a specific synergistic impact was not included. Cumulative impacts were considered to be any impacts which expand and compound over time e.g. the improvement of water quality over time would have a cumulative and positive impact on biodiversity as ecosystems improve which could also have a cumulative effect on landscape.

As the RPGs are for the GDA as a whole region, the strategic impacts across the region are assessed from a regional perspective in cognisance of environmental sensitivities and thus they are prescriptive at a strategic scale.

Table 2: Impact Ratings

Duration and Type of Impact	
S	Short-term - Impact lasting one to seven years
M	Medium-term - Impact lasting seven to fifteen years
L	Long-term - Impact lasting fifteen to sixty years
P	Permanent - Impact lasting over sixty years
T	Temporary - Impact lasting for one year or less
C	Cumulative – Impact that is ameliorated by other impacts
Significance of Impact	
	Major positive
	Positive
	Neutral
	Negative
	Major negative
	Uncertain

4.3.1 RPG Strategy Policies versus Strategy Policies Assessment

The initial stage of the assessment considered the cumulative effects of the RPG strategy policies against each other to determine if certain policies working in combination could have an environmental impact. An assessment matrix was compiled to ascertain the level of environmental impact to the GDA arising from the cumulative effect of policies in combination. This matrix is included in Appendix B.

As the RPG policies have been designed to incorporate sustainability and are cognisant of the GDAs environment, the overall environmental impacts arising through the interaction of policies was positive. While a range of impacts were considered to have uncertain impacts at this stage the potential negative impacts were relatively few. These potential negative impacts were reviewed with the RPG development team so that mitigation could be included in the wording of policies and formation of strategic recommendations.

The potential negative impacts arising from a cumulative effect of policy interaction is as follows;

Policies PIP1 versus GIP5 and GIP6

Policy PIP1 conflicts with policies GIP5 and 6 as the creation or upgrading of transportation corridors and facilities can have a detrimental effect on the landscape of the GDA. However, mitigation measures are included as part of the Green Infrastructure strategic recommendations.

Policy GIP1 versus FRP1

Policy GIP1 and policy FRP1 are in conflict as the protection of built heritage can have negative impacts on preventing / reducing flood risk. Protected river side and coastal built heritage has the capacity to contribute to or exacerbate flood risk. Continued protection of these features could prevent flood risk alleviation. The environmental team recommended that the RPG team include a new strategic recommendation that recognises the need for a balance between public safety and the necessity to protect built heritage.

4.3.2 RPG Policy and Recommendation versus Environmental Objectives Assessment

The assessment process was completed using an environmental assessment matrix using the impact rating shown in Table 2 above. Internal workshops were held with a variety of environmental specialists and each of the RPG strategic policies and recommendations were assessed against the environmental objectives by the environmental team. This matrix is located in Appendix B.

A number of recommendations were made in this initial iteration which were then reviewed in detail with the RPG team during the Assessment 2 Environmental Workshop.

4.3.2.1 Environmental Assessment of Alternative Scenarios

As part of the SEA process, consideration was given to alternative development patterns for the region. The Urban Environment Project has developed four possible development patterns using the MOLAND model.

Consideration of Alternatives

The following scenarios were evaluated as part of the SEA:

1. Baseline/Continued Trends Approach;
2. Finger Expansion of Metropolitan Area;
3. Consolidation of Key Towns & the City;
4. Consolidation & Sustainability and some expansion at nodes on Transport Corridors.

Full details regarding the MOLAND model and the methodology employed can be found in Appendix D of the Environmental Report.

The four Scenarios presented here represent hypothetical end points of different policy directions. The scenarios were assessed using the criteria outlined in Table 3. From a strategic environmental perspective Scenario 3 is considered to be the most sustainable and beneficial for the GDA without compromising existing environmental integrity. The review of the final RPGs was cognisant of this environmental assessment and incorporated the findings into the development of the revised RPGs. The chosen scenario – Scenario 4 was cognisant of the SEA recommendations while being the most sustainable in terms of socio-economic and environmental considerations and relative equitable distribution of growth.

Consideration of Alternatives

There are associated costs and benefits with following any of these paths and the exact direction pursued will be decided by the interaction between planners, policy makers and the public working together.

As the Greater Dublin Area has undergone such massive change in the recent past (McInerney and Walsh 2009) and recent literature has noted a divergence between policy and practice (MacLaran and Williams 2003, Scott et al. 2006) it would be useful to simulate development into the future, expose potential issues before they occur and structure policy accordingly.

Table 3: Environmental Assessment of Alternative Scenarios

RPG Strategic Policies & Recommendations	SEA Environmental Objectives							
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets
Scenario 1: Continued Trend	P	P	P	P	P	P	L	P
Scenario 2: Finger Expansion	P	P	P	P	P	P	L	P
Scenario 3: Consolidation of Key Towns & Metropolitan Footprint	P	P	P	P	P	P	L	P
Scenario 4: Managed Growth	P	P	P	P	P	P	L	P

Table 4: Impact Ratings

Duration and Type of Impact	
S	Short-term - Impact lasting one to seven years
M	Medium-term - Impact lasting seven to fifteen years
L	Long-term - Impact lasting fifteen to sixty years
P	Permanent - Impact lasting over sixty years
T	Temporary - Impact lasting for one year or less
C	Cumulative – Impact that is ameliorated by other impacts
Significance of Impact	
	Major positive
	Positive
	Neutral
	Negative
	Major negative
	Uncertain

4.4 Assessment Stage 2 – Environmental Workshop

A workshop was held between the RPG Team, Environmental Team and the Habitats Assessment Team to proceed through the initial draft assessment of all of the identifiable environmental impacts and make mitigatory amendments as required. Any negative impacts that arose from the assessment process were commented on to provide the RPG Team with environmental recommendations. Negative and uncertain environmental impacts were then further discussed at the workshop with the RPG Team and Habitats Assessment Team to provide mitigation measures or to provide extra recommendations to ensure environmental integrity. A copy of the matrix is contained in Appendix C. A table of all text amendments and additions to the RPG strategies and policies resulting from the Environmental Workshop is also provided in Appendix C.

Examples of strategies and policies that were commented on and recommended changes in the RPGs were:

Rec Ref	Original Text	Amended Text
SR6	All Plans and zoned expansions needed to meet the Settlement Strategy of the RPGs should, where required or considered relevant, undertake a Habitats Directive Assessment in accordance with best practice and guidance ³ of their impact on Natura 2000 sites as part of the planning and decision making process and in considering the most suitable locations or scale for growth in each individual town or newly developing areas to ensure avoidance of negative impact. Where limits may be emerge in certain locations, immediate future growth should directed to more environmentally suitable locations, whilst also keeping within and re directing to other areas designated as growth locations within the Settlement Strategy.	Plans and projects associated with zoned expansions needed to meet Economic Development and satisfy the Settlement Strategy that have the potential to negatively impact on Natura 2000 sites will be subject to HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance. Where limits emerge in certain locations, immediate future growth should be directed to more environmentally suitable locations, whilst also keeping within and re directing to other areas designated as growth locations within the Settlement Strategy.
PIR10	All projects identified undertake a Habitats Directive Assessment in accordance with best practice and guidance* of their impact on Natura 2000 sites as part of the planning and decision making process and in considering the most suitable locations or scale for provision of the project ensure avoidance of negative impact.	Plans and projects associated with the provision of transport, airport or port development, leisure or recreations that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.
PIR25	Development Plans and Local Authorities support through policies and plans the targets for renewable generation so that renewable energy targets for 2020 are met.	Development Plans and Local Authorities support, through policies and plans, the targets for renewable generation so that renewable energy targets for 2020, and any further targets beyond 2020 which become applicable over the duration of the RPG's, are met.
PIR26	That renewable and bio-energy potentials are exploited to their full potential through the advancement of EU and national policy at regional level and the promotion of existing and emerging green technologies.	That low carbon renewable and bio-energy potentials are exploited to their full potential through the advancement of EU and national policy at regional level and the promotion of existing and emerging green technologies.
PIR29	N/A	Ensure that when reviewing County and City Development Plans that an energy masterplan is developed to provide an evidence base to identify the opportunities for decentralised energy and improvements to low carbon energy provision and future proof sustainable energy provision and practices for local communities.

³ Managing Natura 2000 Sites - The provisions of Article 6 of the Habitats Directive 92/43/EEC. European Commission (2000); Assessment of Plans and Projects Significantly Affecting Natura 2000 sites - Methodological Guidance on the Provisions of Article 6(3) and (4) of the Habitats Directive 92/43/EEC. European Commission (2001); Guidance document on Article 6(4) of the 'Habitats Directive' 92/43/EEC - Clarification of the Concepts of: Alternative Solutions, Imperative Reasons of Overriding Public Interest, Compensatory Measures, Overall Coherence, Opinion Of The Commission. European Commission (January 2007).

GIR12	Development and delivery of Bio-Diversity Action Plans in each Council area, examination of suitable locations for designation of Special Amenity Area Orders within each Council area.	Development and delivery of Biodiversity Action Plans in each Council area, and identify biodiversity resources at the initial stages of all planning processes and include them as a material consideration to inform future development.
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4.5 Assessment Stage 3 – Final Draft RPGs

The initial assessment matrix was updated after the environmental workshop outlined above to take on board comments received. This matrix was appended to the Initial Environmental Report that accompanied the draft Regional Planning Guidelines (January 2010). A copy of this matrix is located in Appendix D.

The principal uncertain and negative impacts are outlined below:

4.5.1 Biodiversity, Flora and Fauna

The majority of potential impacts for Biodiversity, Flora and Fauna are positive or neutral. There are however some potential minor negative impacts. These impacts arise from the potential expansion of development into undeveloped and rural areas of the GDA. However, these impacts will be mitigated on a project basis through the environmental impact assessment process.

4.5.2 Population & Human Health

The majority of potential impacts for Population and Human Health are positive or neutral. There are no potential minor negative impacts.

4.5.3 Soil & Geology

The majority of potential impacts for Soils and Geology are currently neutral or uncertain. There are a range of potential negative impacts. As the sustainable development of the GDA requires the use of aggregates for building materials there will always be an impact on the geological resources of the region. However as quarries require an EIA, environmental impact will be addressed at application stage.

4.5.4 Water Resources & Flooding

The RPG strategic policies and recommendations promote the sustainable use and management of the GDAs water resources in line with the objectives and measures of the relevant River Basin Management Plans. The future planning and development of the GDA is required to be in line with the OPWs guidance of planning and flood risk and will be informed by the development of a range of Catchment Flood Risk Assessments and Management Plans which will also be subject to their own SEA process.

A negative impact associated with water resources of the GDA is the potential for impact to groundwater through the use of geological resources. As previously stated such projects will require an EIA and environmental impacts will be assessed in more detail at application stage. A further potential impact is the development of flood risk alleviation measures in river catchments. Such flood relief measures can have negative impacts on catchment character, morphology and habitats. However, it should be noted that such developments eventually integrate into the catchment through adaptation and the mitigation measures provided will minimise potential environmental impacts.

4.5.5 Air & Climate

The majority of potential impacts for Air and Climate in general range from positive to uncertain. The principal potential negative impact arises from the further expansion of air traffic into and out of the region's airports, primarily Dublin Airport. It should be noted however that improvements in aircraft emissions through modern aircraft design and fuel efficiency will reduce the level of impact on climate and human health.

4.5.6 Cultural Heritage including Architectural and Archaeological Heritage

The majority of potential impacts for Cultural Heritage including Architectural and Archaeological in general range from positive to uncertain. However, it is noted that particular regard should be paid to potential localised impacts which can become cumulative impacts across a range of projects in an area subject to large development. This should be addressed throughout the relevant EIA and SEA processes for infrastructure and future developments across the GDA.

4.5.7 Landscape

The majority of potential impacts for Landscape are positive or neutral. However, there are a number of potential minor negative impacts. These negative environmental impacts to landscape arise from the continued urban expansion of the region. It is essential that the region undergoes expansion in a sustainable and environmentally friendly fashion. However, as the populace is predicted to expand the necessary services and infrastructure are required to expand and improve as necessary. This in turn increases the pressure on the landscape both rural and urban.

There are a range of strategic policies and recommendations designed to protect the landscape however and mitigation measures have been proposed throughout the assessment to ensure that the integrity of the GDAs landscape is not compromised.

The landscape is also adaptable and can integrate new developments and infrastructure over time through the inclusion of landscape and visual mitigatory measures. Of particular note in this regard is the necessity for water and wastewater treatment and storage facilities which by their nature have to be located in river valleys adjacent to water features. Flood alleviation measures can also alter the landscape of river valleys through morphological change to the river and alteration of flood plains with protective structure. While these are essential facilities required for the sustainable development of the GDA they can comprise the landscapes integrity.

It is also noted that the EIA process will include landscape assessments and recommendations on a project by project basis at application stage.

4.5.8 Material Assets

The majority of potential impacts for the GDAs Material Assets are positive or neutral. There are however some potential negative impacts which arose through the assessment process in relation the green space in urban areas as well as buffers between the urban and rural landscapes as a material asset. It is advisable for detailed local areas plans to seek avoidance of developing areas of high sensitivity within the zoned lands. Also priority should be given for the development of existing serviced and sequential land. Habitats Directive Assessments shall identify the potential negative impacts on such ecological amenity assets and mitigate appropriately.

4.6 Assessment Stage 4 – Post Consultation Revised RPGs

As part of the ongoing strategic environmental assessment an environmental review of public consultation responses was undertaken, along with further environmental assessment of the updated guidelines that arose from the consultation process.

Stakeholder Involvement

A total of eighty-seven (87) responses were received from the public consultation process. Of that eighty-seven, six (6) were directly relevant to the SEA Environmental Report, while the other submissions also had further information / suggestions for modification of the RPGs policies and strategic recommendations which could influence the sustainable development of the GDA's environment

The six responses directly related to the SEA covered a wide range of environmental issues and were submitted by the following organisations;

- Environmental Protection Agency;
- Department of Environment Heritage and Local Government;
- Dublin City Council;
- Wicklow Town Council;
- Institute of Public Health;
- Bremore Port.

A comprehensive submission was received from the Environmental Protection Agency. Following receipt of their submission a workshop was held with EPA personnel to review their submission and agree and incorporate their submission into both the RPGs and SEA Environmental Report.

Upon review of the each of the public consultation responses pertaining to the SEA process, Arup provided a summary response to the RPG development team about the modifications and additional information that will be incorporated into the SEA Environmental Report as a response to public consultation.

In particular, the Environmental Report required some additional information in the baseline assessment and further consideration of strategic environmental impacts arising from the final iteration of the development of the RPG policies and recommendations. This necessitated an update of the environmental matrix and further revision of the environmental indicators, targets and monitoring.

4.6.1 2nd Environmental Workshop

The RPG development team revised the RPG policies and recommendations where necessary and prudent to incorporate input from the public consultation process and specifically the workshop with the EPA. These revised policies and recommendations were submitted to the SEA and AA teams for assessment. A second environmental workshop was held in April 2010 to discuss the revised policies and recommendations. The workshop was conducted with the SEA, AA and RPG development teams and all environmental issues regarding the updated policies and recommendations were discussed. This resulted in a further iterative revision of the policies and recommendations to ensure sustainable development of the GDA. A copy of this memo and associated matrices is contained in Appendix E.

4.7 Assessment Stage 5 – Directors Motions on RPGs

An environmental assessment was undertaken of the proposed motions arising from the Directors Report for the RPGs. Each motion was assessed from an overall environmental perspective and commentary provided for each motion. The SEA team then undertook a more detailed appraisal of these motions assessed against the environmental objectives.

Revision, rewording and the introduction of additional text to recommendations provided greater emphasis on sustainability and integration of environmental policy into the continuous development of the GDA. Development plans arising from the strategies laid out in the RPGs will consequently, by necessity, need to be more environmentally robust to comply with the RPG recommendations.

Details of the commentary and the assessment matrix are contained in Appendix F.

4.8 Assessment Stage 6 – Final RPGs

A final iteration of the assessment matrix was undertaken which ultimately provides an assessment of the final adopted RPGs.

Incorporating Environmental Considerations

The matrix for the final RPGs largely indicates positive or neutral impacts with a reduction in uncertainty and negative impacts that were previously indicated in the draft RPG assessment. The plan adopted final plan adopted is considered the fairest plan in terms of an equitable and sustainable choice and the other alternative scenarios and plans considered were determined unsuitable in terms of the overall development of a sustainable region.

Any negative impacts that remain arise from conflict between:

- the sustainable development of the GDA in line with the RPGs;
- other plans and programmes relevant to the GDA;
- the preservation of environmental heritage; and
- existing GDA infrastructure and assets which may be impacted upon.

A copy of the final assessment matrix is contained in Appendix G.

4.9 Mitigation Measures

Mitigation

The primary mitigation measure relevant to the GDA is to ensure the sustainable and appropriate development of the GDA in full cognisance of the RPG policies and recommendations.

It is not possible to mitigate all the potential negative impacts, at a regional level. Potential negative impacts, where possible, will have to be mitigated at the county development plan or project level as they arise. However, the RPG policies and recommendations are designed to ensure sustainable development without compromising the integrity of the GDAs natural and built environment.

All new development requiring an Environmental Impact Statement will need to address the range of environmental objectives, indicators and targets, associated environmental mitigation measures and incorporate them into the detailed project specific mitigation measures.

It is considered that due to the regional scale of the RPGs that mitigation measures are considered to be key strategic level recommendations applicable to the region as a whole.

Monitoring

Arising out of the finalisation of the RPG it has been recommended to use the existing RPG GDA Steering Committee to ensure the implementation of mitigation measures and monitoring programmes and to provide regular reporting to the relevant local authorities.

This will be very beneficial in ensuring that all monitoring and indicators are progressed and delivered.

5 FINAL APPRAISAL

5.1 Team Interaction

The SEA process involved the development of strong relationships between the Appropriate Assessment Team, the SEA team and the RPG team, which was based upon excellent communication, transparent research, planning and an iterative assessment processes from inception to completion.

From the onset of the project the overall team (AA, SEA and RPG team) understood the importance of developing clear lines of communication. Communication methods involved meetings; workshops, memos, and email communication.

The SEA and RPG Teams also participated in a number of internal and external workshops in relation to developing the SEA assessment methodology, alternatives to be considered in the SEA, SEA objectives, targets and indicators, mitigation measures and monitoring strategies.

Close involvement of relevant team members in all stages of the project, including SEA scoping; review of the baseline environment; public consultation and scoping ensured integration of the SEA, AA and RPGs.

Consultation was also undertaken with the EPA regarding the methodology, structure and focus of the SEA. Ongoing discussion and meetings were held with the Technical Steering Group, senior representatives of each Local Authority as well as presentation to the local authority elected representatives.

5.2 Assessment Effectiveness

The assessment process was completely iterative between the team developing the RPG Policies and Recommendations; and the environmental team. As a consequence, policies and recommendations were reworded and changed where necessary to accommodate mitigation of environmental impacts.

The final Environmental Report highlighted the range of significant potential positive and negative environmental impacts from the implementation of the RPGs (including cumulative impacts). The Environmental Report for the draft RPGs outlined a number of negative environmental impacts. Subsequent to consultation, the RPGs have been refined to ensure that the development of the GDA is as environmentally sustainable as possible.

While potential negative environmental impacts still remain, a range of mitigation measures have been identified to reduce these negative impacts (See Section 7 of the Environmental Report). Appropriate Assessment required for the Habitats Directive Article 6 report is also noted as being relevant to the measures outlined for Biodiversity, Flora and Fauna, Water Resources, Soils and Geology and Landscape.

The overriding objective of the RPGs is for the environmentally sustainable development of the region. As a consequence, the RPGs strategic recommendations and policies are cognisant of environmental issues from their original inception, through the iterative interaction process of the SEA and throughout the consultation process. This has resulted in the RPGs themselves being as positive for the environment as considered possible

It is considered that the due to the regional scale of the RPGs the mitigation measures proposed are considered to be key strategic level recommendations applicable to the region as a whole.

5.3 Concluding Environmental Assessment

The final plan adopted is considered the fairest plan in terms of an equitable and sustainable choice and the other alternative scenarios and plans considered were determined unsuitable in terms of the overall development of a sustainable region.

The RPGS are a high level document and thus they are prescriptive at a strategic scale and ensure protection, maintenance and enhancement of the regions environment through carefully worded strategic level policies and recommendations.

The joint matrix lead assessment basis of the SEA carried out by SEA and RPG teams provided a holistic, integrated and iterative approach to the formation of the RPG strategies and policies. To this effect the processes of SEA and Guidelines development were seamless.

The iterative nature of this process ensured that policies and recommendations considered were changed where necessary to accommodate mitigation of environmental impacts.

The primary mitigation measure relevant to the GDA is to ensure the sustainable and appropriate development of the GDA in full cognisance of the RPG policies and recommendations. The policies and recommendations are designed to ensure sustainable development without compromising the integrity of the GDAs natural and built environment.

All new development requiring an Environmental Impact Statement will need to address the range of environmental objectives, indicators and targets, associated environmental mitigation measures and incorporate them into the detailed project specific mitigation measures.

As a result of the SEA Process, the use of the existing RPG GDA Steering Committee was recommended to ensure the implementation of mitigation measures and monitoring programmes, as well as to provide regular reporting to the relevant local authorities. This will be very beneficial in ensuring that all monitoring and indicators are progressed and delivered.

Appendix A
**Consultation
Responses**

Ref	Organisation	Comments
a.	DoEHLG / Irish Landscape Institute	Section 7.1. Amend objective to improve access for the appreciation and promotion of wildlife as has potential to impact negatively on wildlife.
b.	DoEHLG	The regional planning guidelines should intend that any new development should integrate with its surroundings in a coherent fashion thereby enhancing the context into which it is placed. It is therefore recommended that the Draft Targets included under the heading of Draft Objectives for Cultural Heritage, including Architectural and Archaeological Heritage, should be expanded to encompass the manner in which policies and objectives in new regional planning guidelines will guide and shape development within the present built environment.
c.	Irish Landscape Institute	<p>With regard to Draft Targets for Travel Patterns the following comments were made</p> <p>“Urban Pedestrian travel patterns – reduce number of road crossings along key routes and improve ease of pedestrian movement in urban areas”</p> <p>Rural lifestyles have become overly dependant on car use, to the detriment of human health and social interaction. Therefore the landscape targets should include: “improve opportunities for non-car based transport in rural areas e.g. off-road walkways and cycleways.”</p> <p>Support the Draft Targets for Cultural Heritage, particularly the need to protect settings of sites and monuments. The integration of conservation measures for historic built and landscape structures could be further targeted by a review of existing monuments to determine if their landscape context is under threat.</p>
d.	Irish Landscape Institute / DCPD	<p>The specific category of Landscape was welcomed. It was noted the target to enhance provision of and access to green space in urban areas (p. 18). It was suggested that this be amended to ‘design and provision’ to reflect the need to ensure standards for quality, not just quantity, of open space. The traditional quantity-based approach is not suitable in urban areas. Mere accessibility does not indicate whether or not is useful or beneficial to the community. It was requested that the wording be changed from ‘urban areas’ to the wider community, to include landscapes which affect the quality of life of citizens of Dublin’s suburbs and villages.</p> <p>The European Landscape Convention stresses the need for careful approaches to the design and management of everyday landscapes as well as those that are considered special or distinctive. Everyday or ordinary landscapes are those in which people live most of their lives and vary greatly in terms of quality. It was proposed that a target to “improve everyday or ordinary landscapes and streetscapes to provide a better setting for day to day life, pedestrian movement and social interaction” be set out.</p> <p>Landscape character is threatened by the loss of urban/rural distinctions – we support this target.</p>

Ref	Organisation	Comments
e.	Irish Landscape Institute / DCPD	<p>With regard to Draft SEA Indicator additional indicators are suggested;</p> <ul style="list-style-type: none"> • Population growth rates compared to increase/decrease of hectares of designated landscapes. • Amount of public parks and open spaces in hectares per capita. • Distance and modes of travel to access community (public/private) open space. • Rates of hedgerow loss in rapidly-developing areas. • Ratio of hardscape to softscape and % loss of vegetated areas in relation to stormwater management and flooding. • Loss of public rights-of-way and walking routes in areas of high visual amenity. • Provision of public open space in areas with high ratings on National Deprivation Index. • Spend per capita on parks and open spaces by each local authority. • Spend/contribution per unit of development on public open space. • % of institutional lands that are open space/undeveloped in each local authority and rate of loss of these lands. • % of river frontage in public and private ownership and nature of land uses by %. • Provision of play facilities per capita. • Pedestrian ease of movement – width of pavements, number and nature of road crossings in urban areas (cities, towns and villages) along key routes.
f.	Lynch & Fegan	<p>Draft Soils & Geology Objective - Safeguard soil and geological quality and quantity. Due consideration must be given to: Heavy Metals, Emerging Contaminants, especially endocrine disrupting compounds, antibiotics, antidepressants and nano compounds. The cumulative effect of this must be carefully noted.</p>
g.	Lynch & Fegan	<p>Soil and water are important material assets. Plasma Arc Technology has to be given serious consideration as a treatment method to protect these.</p>
h.	Lynch & Fegan	<p>While it is good to note the emphasis on Protected species it would be more reassuring to see a proactive concept of ensuring that species would not need to be on a protected list.</p>
i.	Lynch & Fegan	<p>Agricultural soil and water suffer deprecation, as does the agricultural industry, by the spreading of treated sewage. It is recommended that this stop as it merely passes the problem on not solve it.</p>
j.	Lynch & Fegan	<p>Assessment of Alternative Solutions. Some of the main problems arise either in the non-treatment of material or the residue of treatment. Again Plasma Arc Technology needs to be seriously considered so that the various cycles are not inhibited.</p>

Appendix B

**Assessment Stage 1 -
Matrix**

		RPG Strategy																	
		Economic Strategy	Settlement Strategy	Rural Development		Physical Infrastructure					Green Infrastructure, Heritage & Environment						Social Infrastructure	Flood Risk Appraisal	
		EP?	SP1	RP1	RP2	PIP1	PIP2	PIP3	PIP4	PIP5	GIP1	GIP2	GIP3	GIP4	GIP5	GIP6	SIP1	FR1	
RPG Strategy	Economic Strategy	EP?		?	?	?	?	?	?	?	?	?	?	?	?	?	?	?	
	Settlement Strategy	SP1			P	P	P	P	P	P	L	P	P	P	P	P	P	P	
	Rural Development	RP1				P & C	P	P	P	P	P	L	P	P	P	P	P	P	P
		RP2					P	P	P	P	P	P	P	P	P	P	P	P	P
	Physical Infrastructure	PIP1						P	P	P	P	P	P	P	P	P	P	P	P
		PIP2							P & C	P	P	P	P	P	P	P	P	P	P
		PIP3								P	P	P	C	C	C	P	P	P	C
		PIP4									P	P	P	P	P	P	P	P	P
		PIP5										P	P	P	P	P	P	P	P
	Green Infrastructure, Heritage & Environment	GIP1											P	P	P	P	P	P	P
		GIP2												C	C	C	C	C	P
		GIP3													C	C	P	P	C
		GIP4														C	C	P	C
		GIP5															C	P	P
		GIP6																P	P
Social Infrastructure	SIP?																	P	
Flood Risk Appraisal	FR1																		

Key:

Duration and Type of Impact	
S	Short-term
M	Medium-term
L	Long-term
P	Permanent
T	Temporary
Cm	Cumulative
Significance of Impact	
	Major positive
	Positive
	Neutral
	Negative
	Major negative
	Uncertain

Appendix C

**Assessment Stage 2 -
Environmental
Workshop Matrix and
Table of Amended
Policies and
Recommendations**

		RPG Strategy																
		Economic Strategy	Settlement Strategy	Rural Development		Physical Infrastructure					Green Infrastructure, Heritage & Environment						Social Infrastructure	Flood Risk Appraisal
		EP?	SP1	RP1	RP2	PIP1	PIP2	PIP3	PIP4	PIP5	GIP1	GIP2	GIP3	GIP4	GIP5	GIP6	SIP1	FR1
RPG Strategy	Economic Strategy	EP1		C	P	P	P	P	P	P	L	P	P	P	P	P	P	P
	Settlement Strategy	SP1			P	P	P	P	P	P	L	P	P	P	P	P	P	P
	Rural Development	RP1				P & C	P	P	P	P	P	L	P	P	P	P	P	P
		RP2					P	P	P	P	P	P	P	P	P	P	P	P
	Physical Infrastructure	PIP1						P	P	P	P	P	P	P	P	P	P	P
		PIP2							P & C	P	P	P	P	P	P	P	P	P
		PIP3								P	P	P	C	C	P	P	P	C
		PIP4									P	P	P	P	P	P	P	P
		PIP5										P	P	P	P	P	P	P
	Green Infrastructure, Heritage & Environment	GIP1											P	P	P	P	P	P
		GIP2													C	C	C	P
		GIP3														C	C	P
		GIP4														C	C	P
		GIP5															C	P
GIP6																	P	
Social Infrastructure	SIP?																P	
Flood Risk Appraisal	FR1																	

Key:

Duration and Type of Impact	
S	Short-term
M	Medium-term
L	Long-term
P	Permanent
T	Temporary
Cm	Cumulative
Significance of Impact	
Major positive	
Positive	
Neutral	
Negative	
Major negative	
Uncertain	

RPG Strategic Policies & Recommendations	SEA Environmental Objectives								Comment
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets	
Economic Strategy									
Environmental Policy EP1	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
E1	P	P	P	P	P	P	P	P	
E2	P	P	P	P	P	P	P	P	
E3	P	P	P	P	P	P	P	P	
E4	P	P	P	P	P	P	P	P	
E5	P	P	P	P	P	P	P	P	Mention DCU and DIT
E6	P	P	P	P	P	P	L	P	Change wording from wind farms to wind energy. If impact on Natura 2000, an HDA will be required.
E7	P	P	P	P	P	P	L	P	
E8	P	P	P	P	P	P	P	P	Define better "Green Economy" - e.g. For example, low carbon in terms of energy, low water consumption in terms of water and so on
E9	P	P	P	P	P	P	P	P	
E10	P	P	P	P	P	P	P	P	IDA/SDZ have already considered environmental resource requirement
E11	P	P	P	P	P	P	L	P	
E12	P	P	P	P	P	P	P	P	
E13	P	P	P	P	P	P	P	P	Remove word "in the GDA"
E14	P	P	P	P	P	P	P	P	
E15	P	P	P	P	P	P	P	P	Change wording to "for commerce".
E16	P	P	P	P	P	P	P	P	Include word "Seek proactively the delivery".... "of a sustainable water supply"... And "including waste management"
E17	P	P	P	P	P	P	P	P	
Settlement Strategy									
Strategic Policy SP1	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
SR1	P	P	P	P	P	P	P	P	
SR2	P	P	P	P	P	P	P	P	
SR3	P	P	P	C	P	P	P	P	
SR4	P	P	P	C	P	P	C	C	Detailed local areas plans should seek to avoid developing areas of high sensitivity within the zoned lands. Also prioritise developing on serviced and sequential land. Changed landscape to uncertain.
SR5	P	P	P	P	P	P	P	P	
SR6	P	P	P	P	P	P	P	P	Material Assets - Changed from major negative to minor negative. The AA of the LAP will identify the potential impacts and mitigate appropriately. Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance."
Rural Development									
Strategic Policy RP1	P	P	P	P	P	P	P	P	
Strategic Policy RP2	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
RR1	P	P	P	P	P	P	P	P	Councils should promote high quality design incorporating sustainable design
RR2	P	P	P	P	P	P	C	C	Councils should promote high quality design incorporating sustainable design
RR3	P	P	P	P	P	P	P	P	Councils should bring forward by-laws for the provision and management of septic tanks IWWT. Refer to EPA Code of Practice: Wastewater Treatment and Disposal Systems Serving Single Houses (p.e. < 10)", 2009. Principal reason is the protection of group water schemes.
RR4	P	P	P	P	P	P	P	P	
RR5	P	P	P	P	P	P	P	P	
RR6	P	P	P	P	P	P	P	P	
RR7	P	P	P	P	P	P	P	P	Sustainable development requires the use of aggregates, However as quarries require an EIA, environmental impact is addressed at application stage. Changed water resources to major negative. Recognise local impacts but assessment is at a regional level.
Physical Infrastructure									
Strategic Policy PIP1	P	P	P	P	P	P	L	P	EIA will examine issues at project level. SEA at development plan should initially identify any issues and potential impacts for road and rail.
Strategic Policy PIP2	P	P	P	P	P	P	P	P	
Strategic Policy PIP3	P	P	P	P	P	P	P	P	
Strategic Policy PIP4	P	P	P	P	P	P	P	P	This assumes significant investment in renewables
Strategic Policy PIP5	P	P	P	P	P	P	P	P	Change PIP5 wording to "treatment and final disposal of waste"
Strategic Recommendations:									
PIR1	P	P	P	P	P	P	P	P	
PIR2	P	P	P	P	P	P	P	P	
PIR3	P	P	P	P	P	P	P	P	
PIR4	P	P	P	P	P	P	L	P	SEA of the DTA plan will identify their environmental issues.
PIR5	P	P	P	P	P	P	L	P	
PIR6	P	P	P	P	P	P	P	P	
PIR7	P	P	P	P	P	P	L	P	Improvements in aircraft emissions will reduce the impact on climate and human health.
PIR8	P	P	P	C&L	C&P	P	L	C&P	
PIR9	P	P	P	P	P	P	P	P	
PIR10	P	P	P	P	P	P	P	P	Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance."
PIR11	P	P	P	P	P	P	P	P	
PIR12	P	P	P	P	P	P	P	P	
PIR13	P	P	P	P	P	P	P	P	
PIR14	P	P	P	P	P	P	P	P	Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to article 6 of the Habitats Directive and in accordance with best practice and guidance."
PIR15	P	P	P	P	P	P	P	P	
PIR16	P	P	P	P	P	P	P	P	
PIR17	P	P	P	C	P	P	P	P	Detailed SEA and EIA will identify environmental impacts and mitigation.
PIR18	P	P	P	P	P	P	P	P	
PIR19	P	P	P	P	P	P	P	P	Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance."
PIR20	P	P	P	P	P	P	P	P	
PIR21	P	P	P	P	P	P	P	P	
PIR22	P	P	P	P	P	P	P	P	
PIR23	C	C	P	C	P	P	P	C	Uncertain as wording says "address the relationship" as opposed to protect, minimise, etc.. Change wording to "between significant land, arterial drainage and navigation" and " ...possible impact to protect and where appropriate minimise possible impact on both large"

RPG Strategic Policies & Recommendations	SEA Environmental Objectives								Comment
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets	
PIR24	P	P	P	P	P	P	P	P	Uncertain due to lack of knowledge of siting and types of technologies. Project specific impacts will be addressed though EIA as appropriate.
PIR25	P	P	P	P	P	P	P	P	The policy outlines that plans and policies should support the targets for renewable energy so that renewable energy targets for 2020 are met. However, the lifespan of these guidelines are 2022. The recommendation should therefore be reworded to recognise further targets that may come on board during the lifetime of this plan.
PIR26	P	P	P	P	P	P	P	P	Through consultation with the EPA sustainable renewable energy should be included in text. Change wording "that low carbon renewable and bio-energy ..."
PIR27	P	P	P	P	P	P	P	P	On assumption that mitigation measures are followed in the noted guidance documents. Suggest inclusion of additional recommendation: "Ensure that when reviewing County and City Development Plans that an energy masterplan is developed to provide an evidence base to identify the opportunities for decentralised energy and improvements to low carbon energy provision and future-proof sustainable energy provision and practices for local communities".
PIR28	P	P	P	P	P	P	P	P	
PIR29	P	P	P	P	P	P	P	P	
PIR30	P	P	P	P	P	P	P	P	Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance.
PIR31	P	P	P	P	P	P	P	P	
PIR32	P	P	P	P	P	P	P	P	
PIR33	P	P	P	P	P	P	P	P	
PIR34	C	C	P	P	C	P	P	C	
PIR35	P	P	P	P	P	P	P	P	Reword PIR35 to cover all waste types (facilities). Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to article 6 of the habitats directive and in accordance with best practice and guidance.
Green Infrastructure, Heritage & Environment									
Strategic Policy GIP1	P	L	P	P	L	P	P	P	
Strategic Policy GIP2	P	P	P	P	P	P	P	P	National monuments relating to ecology including for example Phoenix park
Strategic Policy GIP3	P	P	P	P	P	P	P	P	
Strategic Policy GIP4	P	P	P	P	P	L	P	P	ICZM is a combination of management of flood risk, ecology, cultural heritage human safety, amenity and economics
Strategic Policy GIP5	P	P	P	P	P	P	P	P	
Strategic Policy GIP6	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
GIR1	P	P	P	P	P	P	P	P	
GIR2	P	P	P	P	P	P	P	P	
GIR3	P	P	P	P	P	P	P	P	
GIR4	P	P	P	P	P	P	P	P	
GIR5	P	P	P	P	P	P	P	P	
GIR6	P	C	P	P	P	C	P	P	
GIR7	P	C	P	P	C	C	C	P	
GIR8	P	C	P	P	P	C	C	P	
GIR9	P	P	P	P	P	P	P	P	Changed from positive to uncertain
GIR10	P	C	P	P	P	P	P	P	
GIR11	P	P	P	P	P	P	P	P	Change wording to "Local Authority Heritage Plans"
GIR12	P	P	P	P	P	P	P	P	This recommendation will be split. First part will stay same. Second part will move to landscape section.
GIR13	P	C	C	C	C	P	C	P	
GIR14	P	P	P	P	P	P	P	P	
GIR15	P	P	P	P	P	P	P	P	
GIR16	P	P	P	P	P	P	P	P	remove word "urban" from SUDS
GIR17	P	P	P	P	P	P	P	P	
GIR18	P	P	P	P	P	P	P	P	
GIR19	P	P	P	P	P	P	P	P	A new GIR should be included taking account of Habitats Directive.
GIR20	P	P	P	P	P	P	P	P	
GIR21	P	P	P	P	P	P	P	P	
GIR22	P	P	P	P	P	P	P	P	
GIR23	P	P	P	P	P	P	P	P	
GIR24	P	P	P	P	P	P	P	P	
GIR25	P	P	P	P	P	P	P	P	
GIR26	P	P	P	P	P	P	P	P	
GIR27	P	P	P	P	P	P	P	P	
GIR28	P	P	P	P	P	P	P	P	
GIR29	P	P	P	P	P	P	P	P	
Social Infrastructure									
Strategic Policy									
SIP1	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
SIR1	P	P	P	P	C	P	P	P	
SIR2	P	P	P	P	P	P	P	P	
SIR3	P	P	P	P	P	P	P	P	
SIR4	P	P	P	P	P	P	P	P	
SIR5	P	P	P	P	P	P	P	P	
SIR6	P	P	P	P	P	P	P	P	Add footnote to include HDA .
SIR7	P	P	P	P	P	P	P	P	
SIR8	P	P	P	P	P	P	P	P	
Flood Risk Appraisal									
Strategic Policy FR1									
FR1	P	P	P	M	P	P	M	P	
Strategic Recommendations:									
FR1	P	P	P	P	P	P	M	P	
FR2	P	P	P	P	P	P	P	P	
FR3	P	P	P	P	P	P	P	P	A new FR should be included talking into account the Habitats Directive.

Amended policies and recommendations of RPG document.

Blue amendments arise consequent of SEA or EPA. Light Blue are changes consequent of HDA. In some cases the numbering has also been amended, and grammatical errors corrected.

<i>Strategic Policy EP1</i>	
That the Dublin Gateway is recognised as an international driver of enterprise within the GDA and is supported by regionally designated strategic employment centres, serving the urban and rural hinterlands. These economic growth areas which take advantage of nationally important transport hubs and corridors, and shall provide the focal point for diverse regional enterprise and economic clustering activity, by: steering population growth and economic critical mass to designated RPG strategic growth centres of the identified economic areas or gateway region; capacity building in skills, innovation and education; critical infrastructural investment in ICT, public transport, water services; integrating high quality social and amenity provisions to create an attractive landscape and working environment; providing energy security supported by green and renewable technologies; rationalised planning approaches to employment based land use zoning and enterprise objectives.	
<i>Strategic Policy EP2</i>	
To seek sustainable economic growth across the GDA, by the promotion of identified core economic areas across the GDA to facilitate new employment opportunities for existing populations and seek to reduce the volume of unsustainable long distance commuting.	
ER1	Deliver the GDA as an attractive international destination for business, with the city region and identified strategic economic growth centres as focal points for regional critical massing and employment growth, in order to sustain, promote, develop and attract economic activity. (HDA mitigation, appendix \$)
ER2	Support the development of linkages between strategic urban employment centres and rural based settlements in terms of skills, promotion of business links, communications infrastructure and transport corridors to ensure balanced regional development and employment opportunities for dispersed settlements. (HDA mitigation, appendix \$)
ER3	Encourage mixed use settlement forms and sustainable centres, in which employment and residency are located in close proximity to each other and strategic multi-modal transport corridors, which promote a choice of sustainable travel modes, green travel choices and to arrest long distance commuter trends and congestion. (HDA mitigation, appendix \$)
ER4	Support entrepreneurship and enterprise in tandem with those corresponding social and community services and facilities which are necessary for quality of life and economic prosperity and support the social economy in areas such as arts, culture, environment and services/goods which contribute to the quality of life of the GDA population.
ER5	Develop the GDA as regional leader in the ‘Smart Economy’ and the Dublin Gateway as a ‘SMART City’ by: Supporting the recommendations of the Economic Development Action Plan for the Dublin City Region and related ‘strands’ of the Action Plan, as adopted. Supporting the provision of a Mid East Economic Development Action Plan, developed and branded in association with the local authorities and national and local enterprise agencies, taking account of the locational behaviour and requirements of the next generation of FDI projects, infrastructure capabilities, and importance of critical massing and capacity building in skills and education.

	Supporting innovations in knowledge and technology flows through such initiatives developed between NUIM and Intel; the UCD/Trinity Innovative Alliance, and Enterprise Irelands Technology Transfer Strengthening Initiative and other forums. Developing and promoting regional specialisms and centres of excellence with the Gateway region and in the primary economic growth towns and their clusters(HDA mitigation, appendix \$)
ER6	Support the development of economic clusters and sectoral opportunities around the RPG strategic growth towns and core economic areas and support policies which facilitate opportunities for clustering activities which have a tangible locational requirement outside these centres including those relating to green economy projects such as renewable energies – e.g. wind energy and bio fuel crop production; innovation and eco parks; food production and agri-business; horticulture and rural based tourism. (HDA mitigation, appendix \$)
ER7	Promote and support the role of Dublin Airport as the primary gateway to Ireland and the GDA and as an important employment hub and business location in the region through land use planning which facilitates future airport capacity needs and by improved transport linkages to the city and region. (HDA mitigation, appendix \$)
ER8	Develop policies which support opportunities within the Green Economy ¹ , consistent with best planning practices. (HDA mitigation, appendix \$)
ER9	Promote factors of competitiveness and exploit opportunities and mechanisms for the realisation of entrepreneurship and sustainable businesses including diversification of services and manufacturing sectors through the provision of suitably zoned, serviced lands and soft and hard infrastructural investments in a planned and strategic manner. (HDA mitigation, appendix \$)
ER10	Work with employment and enterprise agencies to identify and deliver strategic employment sites for development at suitably identified locations as advocated in this strategy, such as Intellectual Enterprise Zones, SDZ's and IDA supported sites and examine regional consistencies in land use zoning for enterprise. Current employment related land use objectives in Development Plans should be reviewed to take account of the RPG economic strategy. (HDA mitigation, appendix \$)
ER11	Continue emphasis on enhancing sustainable transport connectivity through the region and the city, including the operational programme of works advocated under Transport 21. (HDA mitigation, appendix \$)
ER12	Continue emphasis on the development of broadband infrastructure and services in conjunction with DCENR and the private sector for the GDA.
ER13	Recognise that ports play have an important role in support of export led growth. In order to ensure that port capacity constraints do not hamper growth in the export sector, sufficient port capacity is required. (HDA mitigation, appendix \$)
ER14	Direct new retail floor space into existing centres with significant population bases and those centres selected for additional population growth. Future provision of significant retail developments within the GDA should be consistent with the policies and recommendations of the Retail Planning Guidelines for Planning Authorities and with the Retail Planning Strategy for the Greater Dublin Area 2008 (and as updated). (HDA mitigation, appendix \$)
ER15	Promote the delivery of a high quality built environment in urban centres to ensure the attractiveness of these areas for commerce.
ER16	Seek proactively the delivery of new sustainable water supply, waste water treatment and waste management infrastructure without which the future development of the GDA will be impossible. (HDA mitigation, appendix \$)

¹ Including opportunities for low carbon in terms of energy, low water consumption etc.

ER17	Encourage and facilitate new employment opportunities within hinterland towns with high levels of long distance commuting amongst the existing population to provide new local employment opportunities and assist in reducing long distance commuting patterns and build up the local economy to a more locally sustainable level.
ER18	In achieving sustainable and balanced employment within the GDA, the Regional Planning Guidelines support the improvement of jobs ratio levels in each of the constituent local authorities of the region and each local authority should include an objective or series of measures, compliant with the RPG economic strategy, to foster employment creation and maximise the jobs potential in growth towns.
<i>Strategic Policy SPI</i>	
The delivery of new housing in the GDA shall support the NSS, Smarter Travel and the DoEHLG Guidelines on Sustainable Residential Development. The RPG Settlement Strategy encourages the focusing of new housing development on (i) consolidation within existing built footprint with particular focus on the metropolitan area; (ii) supporting the achievement of sustainable towns; (iii) supporting national investment in public transport services by focusing new development areas to key locations to achieve the integration of landuse and high quality public transport provision, and (iv) build up economics of scale for services in identified growth towns. (HDA mitigation, appendix \$)	
SR1	Each Council shall address through the Core Strategy and associated tables and text how the Development Plan meets the housing requirements described in the RPGs. This may involve the prioritisation of lands within Local Area Plans and Towns Plans in phasing arrangements to ensure that development is prioritised in its delivery in line within RPG policies. (HDA mitigation, appendix \$)
SR2	Future expansion in housing land areas in all towns should follow a clear sequential approach in accordance with the Development Plan Guidelines and the Sustainable Residential Development in Urban Area Guidelines ² , with options and opportunities for brownfield/regeneration sites prioritised, and any large designation of new housing lands expanding the current built up footprint of the Metropolitan Area should be directly linked to provision of new, existing or upgraded high quality rail based public transport services. (HDA mitigation, appendix \$)
SR3	The allocation and prioritisation of future housing lands provided through the life of the Development Plan and sub-ordinate Local Area Plans shall ensure that the required provision of lands is made in the metropolitan areas of each Council as set out in the tables ** above. For the hinterland areas each Council should aim for the majority of new housing provided for through zoning and policies to be directed towards the Growth Towns, weighted towards the Large Growth towns in the settlement hierarchy and also particularly towards towns with rail based public transport, to achieve the identified vision and policy of the RPGs. It is the aim of the RPGs that during the life of the RPGs that this percentage of lands directed to the upper tiers of the hierarchy increases by 20% by 2022. (HDA mitigation, appendix \$)
SR4	Towns and lands zoned outside of key priority locations shall be managed through phasing policies in Local/Town/County Development Plans to ensure that limited amounts over a longer time period are developed to allow for natural increase and local needs, without undermining the settlement strategy of the RPGs and to ensure that focused growth in designated growth towns can be achieved during the life of the County Development Plan. (HDA mitigation, appendix \$)
SR5	The expansion and growth of towns in the GDA is predicated on the delivery of suitable and necessary infrastructure. Local Area and Developments Plans need to take into account the current and future infrastructure needs of zoned lands and

² Published by the Department of Environment, Heritage and Local Government in 2007 and 2009 respectively, see www.environ.ie.

	ensure that future development is only permitted where necessary water services have been provided to avoid causing a risk to the environment and is in accordance with existing and future discharge licences for waste water facilities.
SR6	Plans and projects associated with zoned expansions needed to meet Economic Development and satisfy the Settlement Strategy that have the potential to negatively impact on Natura 2000 sites will be subject to HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance. Where limits emerge in certain locations, immediate future growth should be directed to more environmentally suitable locations, whilst also keeping within and re directing to other areas designated as growth locations within the Settlement Strategy.
<i>Strategic Policy RP1</i>	
	To protect and support rural villages and countryside through careful management of physical and environmental resources and appropriate sustainable development; recognising and responding through appropriate Development Plan policies to the strong urban driven demand for resources in rural areas of the GDA, and also the importance of protecting and encouraging the necessary social infrastructure needed to sustain rural communities. (HDA mitigation, appendix \$)
<i>Strategic Policy RP2</i>	
	To support the continuing viability of agriculture, horticulture and other rural based enterprises within rural areas and to promote investment in facilities supporting rural innovation and enterprise with special emphasis on the green economy, within the context of sustainable development, appropriateness and the management of environmental resources. (HDA mitigation, appendix \$)
RR1	Rural housing policies within Development Plans and Local Area Plans take account of and are tailored to meet the differing types of rural housing demands and management needs in varying rural contexts such as rural areas under strong urban influence, rural areas in strong rural areas and rural areas which are structurally weak and/or dispersed settlement areas, and to distinguish between urban and rural generated housing demands as defined in the ‘Sustainable Rural Housing Guidelines for Planning Authorities April, 2005. (HDA mitigation, appendix \$)
RR2	Local Authorities produce policy documents promoting high quality design and layout for rural development through the provision of rural housing guidelines, village design statements and clear guidance within Development Plans regarding infrastructural and other technical requirements and through the development management and enforcement procedures.
RR3	Development plans should include and promote proactive measures and policies to address infrastructural deficits and to support rural based communities in terms of access to and provision of: education, employment, health care, local retail provision, childcare, day care, public transport, targeted or specific community facilities aimed at the vulnerable and other necessary services to ensure the continued longevity of rural living. The EPA code of practice for wastewater treatment and disposal systems for single houses (p.e. 10 or less) 2009 should also be adhered to in order to safeguard individual and group water schemes. (HDA mitigation, appendix \$)
RR4	Needs of leisure and rural tourism be addressed in a multi-disciplinary manner in high pressure locations, taking into account natural, economic, social and cultural policy objectives and plans. Balance is required between the need to preserve the natural environment; the needs of modern farming and also making the countryside and natural areas accessible to those who wish to avail of it. Feasibility studies and best scientific evidence can be utilised to ensure that this balance is achieved.
RR5	Rural development planning must continue to incorporate wider environmental issues such as water management as outlined through the Water Framework Directive and associated Plans, soil quality, biomass fuels and alternative energies. The need to protect, maintain and enhance the quality of groundwater and surface water across

	the ERBD and SERBD and the importance of consulting monitoring data wherever possible to ensure that development in rural areas does not negatively impact on the quality of groundwater and its subsequent extraction as drinking water, and on areas of rivers with pristine water quality.
RR6	Development plans policy to be supportive towards rural entrepreneurship and the development of micro-businesses where environmental impact is minimal, and does not generate significant or undue traffic. This action will need to be supported through improved ICT provision, uptake, training and assistance in adapting to market oriented agriculture. (HDA mitigation, appendix \$)
RR7	Development Plans map key natural aggregate resources and protect these where feasible from inappropriate development; and include policies regarding requirements for assessing applications for aggregate extraction which require the addressing of key environmental, traffic and social impacts and details of rehabilitation. (HDA mitigation, appendix \$).
RR8	Plans and projects associated with rural development, including the provision of housing and associated infrastructure and resource exploitation, which have the potential to negatively impact on Natura 2000 sites, will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.
<i>Strategic Policy PIP1</i>	
	Future investment in transport in the GDA shall serve the needs of the GDA by: (i) providing efficient and effective and sustainable means of moving people and goods for business, family and leisure purposes which minimises the environmental impact and the social and economic cost to users; (ii) allows for the development of a landuse strategy that supports sustainable development; and (iii) supports growth and efficiencies in economic activity for both the GDA and the State. (HDA mitigation, appendix \$)
PIR1	Local Authorities should continue to develop further the policy of consolidation of regional population growth and employment in areas best served by public transport and a range of transport modes which support the transport initiatives indicated within ‘Transport 21’ and the National Transport Authority strategy for Dublin and to promote higher densities/trip intensive uses in such areas, subject to normal planning criteria. (HDA mitigation, appendix \$)
PIR2	Development Plans should include policies and provisions which are consistent with and facilitate the implementation of the Smarter Travel Documents ‘A Sustainable Transport Future A -New Transport Policy for Ireland 2009 – 2020’ and ‘National Cycle Policy Framework (NCPF) 2009 –2020’.
PIR3	That Land Use and Transport Strategies (LUTS), where completed for towns in the GDA, inform future planning decisions for sustainable future growth in key development areas. (HDA mitigation, appendix \$)
PIR4	Local Authorities shall liaise with the National Transport Authority (NTA) and other relevant transport bodies in relation to the preparation of future Development and Local Area Plans. Councils should, in consultation with the NTA, identify and reserve lands and corridors for future transport needs to facilitate the delivery of strategic transport infrastructure required to serve the GDA. (HDA mitigation, appendix \$)
PIR5	Plans and policies should identify and protect strategic road corridors and their principle function as arterial routes for the movement of goods, services and people between settlement areas within and outside the GDA. Long term junction capacity and carrying capacity should not be adversely affected by inappropriate and dispersed development. Plans and policies need also to be cognisant of the challenges and needs where such roads bisect urban areas identified for growth in the RPGs and the need for strong connectivity within the urban fabric. (HDA mitigation, appendix \$)

PIR6	Councils should encourage the targeting of sustainable rural transport investment towards those who would otherwise have difficulty accessing services, access to employment and other key provisions by supporting measures such as those outlined in the Rural Transport Initiative. (HDA mitigation, appendix \$)
PIR7	Relevant Local Authorities should include provisions and zoning policies which support the delivery of high quality transport links to Dublin Airport; ensure that suitable lands are appropriately zoned to allow future expansion and restrict (and where appropriate, prohibit) development in public safety zones and approach zones of all GDA airports and airfields, and noise zones associated with airport flight operations. (HDA mitigation, appendix \$)
PIR8	To make provisions in future Plans that examine the growth of Dublin Port and the possibility of a new Port facility on the coast of the GDA to facilitate future long term growth needs of the State, in accordance with the planning and environmental processes and Authorities should liaise with Port and Harbour Authorities in their area to identify key issues and support the role of smaller ports and harbours in the GDA. (HDA mitigation, appendix \$)
PIR9	Support through policies, development management and actions of the Council a culture for walking and cycling in the GDA through a series of proactive sustainable measures including infrastructure and design provisions which support and encourage walking and cycling, priority provisions within urban areas and education programmes. Furthermore the national target of 10% of all trips by bicycle by 2020 within the National Cycle Policy Framework (NCPF) 2009 –2020’ should be viewed as a minimum standard to be exceeded, particularly within the metropolitan area of the GDA. (HDA mitigation, appendix \$)
PIR10	Plans and projects associated with the provision of transport, airport or port development, leisure or recreations that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.
<i>Strategic Policy PIP2</i>	
Protect and work to improve water quality in and impacted by the GDA and seek that investment in water supply projects is prioritised to support the delivery of the economic and settlement strategy for the GDA through the coordinated and integrated delivery of all essential services supporting national investment. (HDA mitigation, appendix \$)	
PIR11	GDA Local Authorities and the DoEHLG continue investment in the identification of a sustainable major new long term source of water for the GDA, and planning and development for the required infrastructure to store and distribute large volumes of water in the Dublin Water Region continues. (HDA mitigation, appendix \$)
PIR12	All Councils, supported by the DoEHLG, continue rolling programmes of investment in water conservation and demand management so that the short terms needs can be met through better use of existing resources.
PIR13	Investment is made in improving water storage, distribution, supply and quality in all locations across the GDA to ensure that public health is maintained and that lack of water does not restrict the expansion and development of identified growth towns in the GDA, and so that the future needs of industry can be met. (HDA mitigation, appendix \$)
PIR14	Plans and projects associated with water supply and water management that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.
<i>Strategic Policy PIP3</i>	

<p>Protect and work to improve water quality in and impacted by the GDA and seek that investment in waste and surface water treatment and management projects is prioritised to support the delivery of the economic and settlement strategy for the GDA through the coordinated and integrated delivery of all essential services supporting national investment. (HDA mitigation, appendix \$)</p>
<p>PIR15 Seek continued investment in Waste Water Treatment facilities and networks to meet the needs of the River Basin Management Plans and to achieve the targets for good water status for river, coastal and transitional waters in the Water Framework Directive. (HDA mitigation, appendix \$)</p>
<p>PIR16 Ensure that future capacity is provided in growth towns through expansion and upgrading of facilities where necessary and/or exploration of alternatives such as connecting to adjoining drainage systems or changes to catchments to enable growth towns to provide for the population growth envisaged in the settlement strategy and thus enable a more sustainable settlement pattern to be supported. (HDA mitigation, appendix \$)</p>
<p>PIR17 Identification and development of a suitable site for the Regional Coastal plant in the north coast of the GDA to enable the continued population and economic growth and the physical consolidation of the metropolitan area, by reducing the catchment size for Ringsend and providing new treatment capacity through network connections. (HDA mitigation, appendix \$)</p>
<p>PIR18 The management of landuse and policies of Development Plans, Local Area Plans and Development Management decisions shall ensure that the scale of development is managed to achieve compliance with the waste water discharge licences of waste water treatment facilities. Breach of compliance is now a criminal offence under the EU Directives 2006/11/EC and 2000/60/EC given effect in the Waste Water Discharge Regulations 2007.³ (HDA mitigation, appendix \$)</p>
<p>PIR19 Plans and projects associated with all waste water and/or surface water treatments that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance</p>
<p>PIR20 Full implementation of new development and environmental management policies developed in the GSDS project, including Sustainable Drainage Systems (SuDS).</p>
<p>PIR21 Integration within urban areas of pluvial and drainage models to achieve an integrated response and mutually supportive actions to prevent pluvial flooding and pollution of receiving waters. (HDA mitigation, appendix \$)</p>
<p>PIR22 Provision of ground water protection schemes/plans in accordance with Groundwater Protection Schemes Guidelines and other necessary measures in order to maintain and where appropriate, improve the quality of ground water.⁴</p>
<p>PIR23 Policies within Development Plans must address the relationship between significant land, arterial drainage and navigation and other works or changes in use and the possible impact to protect and where appropriate minimise possible impact on both large scale flood risk, aquatic habitats and Natura 2000 sites from individual works and also cumulative effects from a number of developments within a river catchment.</p>
<p>PIR24 All water management plans should take account of the possible impact of climate change in the future in relation to changes to volumes of rainfall, river flows, sea level rise and frequency of storm events. (HDA mitigation, appendix \$)</p>
<p><u>Strategic Policy PIP4</u></p>
<p>That the ICT and energy needs of the GDA shall be delivered through the time of the RPGs though investment in new projects and corridors to allow economic and community needs to</p>

³ SI No.684 of 2007, Circular PD7/09

⁴ In cooperation with the Geological Survey of Ireland.

	be met, and to facilitate sustainable development and growth to achieve a strong and successful international GDA Gateway. (HDA mitigation, appendix \$)
PIR25	That reinforcements and new infrastructure are put in place by the key agencies, and their provision is supported in Local Authority policies, to ensure the energy needs of future population and economic expansion within designated growth areas and across the GDA can be delivered in a sustainable and timely manner and that capacity is available at local and regional scale to meet future needs. (HDA mitigation, appendix \$)
PIR26	Development Plans and Local Authorities support, through policies and plans, the targets for renewable generation so that renewable energy targets for 2020, and any further targets beyond 2020 which become applicable over the duration of the RPG's, are met. (HDA mitigation, appendix \$)
PIR27	That low carbon renewable and bio-energy potentials are exploited to their full potential through the advancement of EU and national policy at regional level and the promotion of existing and emerging green technologies. (HDA mitigation, appendix \$)
PIR28	To ensure that planning policy at Local Authority Level reflects and adheres to the principles and planning guidance set out within Department of the Environment Heritage and Local Government publications relating to 'Telecommunications Antennae and Support Structures', 'Wind Energy Development' and any other relevant guidance which may be issued in relation to communications and sustainable energy provisions. (HDA mitigation, appendix \$)
PIR 29	Ensure that when reviewing County and City Development Plans that an energy masterplan is developed to provide an evidence base to identify the opportunities for decentralised energy and improvements to low carbon energy provision and future proof sustainable energy provision and practices for local communities. (HDA mitigation, appendix \$)
PIR30	Continued promotion of opportunities by all relevant agencies and stakeholders to achieve an internationally competitive ICT sector is developed putting the GDA on a par with leading European regions by investment in broadband.
PIR31	Future corridors for energy transmission or pipelines should avoid creating sterile lands proximate to key public transport corridors, particularly rail routes. (HDA mitigation, appendix \$)
PIR32	Seek the delivery of the necessary integration of transmission network requirements to facilitate linkages of renewable energy proposals to the electricity transmission grid; and continued support by all key stakeholders of energy conservation measures. (HDA mitigation, appendix \$)
PIR33	Plans and projects associated with the generation or supply of energy or telecommunication networks that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance
<i>Strategic Policy PIP5</i>	
	To ensure, from environmental, business and public health needs, that waste management remains a priority for local authorities and waste management regions in continuing to invest in promoting and facilitating reuse and recycling by residential and commercial sources and that high standard options for treatment and final disposal of waste are available within the GDA. (HDA mitigation, appendix \$)
PIR34	The new waste management strategy across the regions of the GDA should seek to facilitate a balanced use of resources and greater adaptability and robustness of services. Integrated waste management should be considered from the perspective of the GDA as one singular functioning economic and spatial unit and to increase economies of scale.

PIR35	Encourage the expansion of increased levels of diversion of biodegradable waste from landfill through provision of or support for biological treatment facilities and home composting.
PIR36	Ensure that newly developing and existing areas incorporate bring banks and recycling within the built up urban area in order to facilitate sustainable development and higher rates of recycling.
PIR37	The reuse of waste should be encouraged and reinforced through encouragement of business clustering across the GDA. Opportunities to facilitate the reuse of wastes, by-products and associated energy throughout the GDA should be examined as part of economic policies.
PIR38	Plans and projects associated with waste management that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance
<i>Strategic Policy GIP1</i>	
To ensure that all aspects of the built heritage including archaeological, industrial, and architectural heritage, are suitably protected, enhanced, sensitively reused/ integrated into new development works and incorporated in development plans, records of protected structures, heritage plans and site specific projects & developments	
GIR1	Continue to protect through Development and Local Area Plan policy and zoning, design frameworks and other planning documents and through the development management process, all national sites and monuments identified on the national record and also other archaeological sites that emerge through investigative or construction works in cooperation with the Department of Environment, Heritage and Local Government.
GIR2	Adopt plan policies and objectives to manage, protect, enhance, and/or sensitively integrate, where appropriate, all areas of heritage, as defined within the Heritage Act.
GIR3	Carry out thematic heritage audits, including those relating to industrial heritage, in order to inform policy and decision making in the planning process and where appropriate, inclusion in the Record of Protected Structures. Continue to actively protect through development plan policy and development management decisions, Architectural Conservation Areas, protected structures and vernacular buildings.
GIR4	Through actions such as school and education programmes, heritage plan actions, and interaction between statutory bodies, local authorities and local communities in the form of workshops and resource programmes to promote awareness and increased stewardship of built heritage within the community.
GIR5	Promote, where appropriate, settlement identity through traditional plot sizes, street patterns, street furniture and building scales in the development of towns, villages and hamlets.
GIR6	Continue to provide Local Authority grant assistance to individuals in relation to specific conservation projects, where practical.
GIR7	Promote sensitive retrofitting of established building stock, where appropriate.
GIR8	Improve the appearance and character of areas with particular townscape character by actively protecting their distinctive identities.
GIR9	Seek protection, enhancement and sensitive integration/re-use, as may be appropriate of heritage transport corridors, including rail, road and water corridors, to ensure their long term future and their role in relation to access provision, tourism development, biodiversity space and development buffers.
GIR10	Undertake research to identify key historic landscapes within Council areas which merit protection and support outcomes through policies and objective in Development Plans.

<i>Strategic Policy GIP2</i>	
	To protect and conserve the natural environment, including in particular nationally important and EU designated sites such as Special Protection Areas, Candidate Special Areas of Conservation and proposed Natural Heritage Areas, protected habitats and species, and habitats and species of local biodiversity value . Appropriate measures to protect Natura 2000 sites should be identified at the initial stages of all planning processes and included as a material consideration in order to inform future development
GIR11	Continued development and renewal of Local Authority Heritage Plans in each Council area working with all key stakeholders to identify and deliver a range of actions and programmes to support heritage in the Council area.
GIR12	Development and delivery of Biodiversity Action Plans in each Council area, and identify biodiversity resources at the initial stages of all planning processes and include them as a material consideration to inform future development.
GIR13	To promote awareness, and protection of shellfish and non invasive molluscs, including their breeding and feeding areas, from on-site and external sources of pollution.
GIR14	Expansion of the programme to protect important individual or groups of trees through greater use of tree protection orders through the undertaking of an inventory of the Council area where funding allows.
GIR15	Continued use of policies to protect view and prospects in the Development Plan and local area plan process to facilitate passive enjoyment of the heritage of the landscape.
<i>Strategic Policy GIP3</i>	
	To ensure alignment between the core objectives of the Water Framework Directive, (including River Basin Management Plans and POMS affecting the Greater Dublin Area) and other related plans such as County Development Plans and related Local Area Plans; Habitat and Species Protection Plans under the Habitats Directive, Water Services Investment Programme, Nitrates Action Programme; and Flood Management Plans.
GIR16	Local authorities incorporate the issues from the River Basin Management Plans in their jurisdiction into the plan making process so that the implications of development on water quality is a key driver in identification of suitable locations for new development.
GIR17	Development Management objectives and guidance places strong emphasis on the need for Sustainable Drainage Systems and water management to reduce both flood risk, overflows and the washing of pollutants from surface areas into receiving waters and to support ecological processes.
GIR18	Areas of high ecological status in the River Basin Management Plans are identified in Development Plans and specific policies to protect their status are incorporate in the Plans, including restrictions on types of development which impact on water quality.
GIR19	Include ground water protection measures in Development and Local Area Plans in accordance with consultation with the DoEHLG, EPA, GSI and any other relevant licencing bodies.
GIR 20	Plans and projects that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance
<i>Strategic Policy GIP4</i>	
	Promote the development of cross boundary Integrated Coastal Zone Management with all coastal local authorities in the GDA area so that future Development Plans can be guided in relation to the management of coastal areas drawing from a mutually supported plan for marine and coastal areas which has engaged with key stakeholders. (HDA mitigation, see appendix \$).

GIR21	The completion of an ICZM for Dublin Bay, building on research and working collaboratively to achieve an agreed framework Plan incorporating land and marine planning and policies in an integrated manner and with regards to Article 6 of the Habitats Directive .
GIR22	The expansion of collaborative ICZM for similar cohesive coastal landscape blocks to Dublin Bay along the eastern seaboard, taking account of the Water Framework Directive and Flood Risk Assessment studies and Article 6 of the Habitats Directive .
GIR23	That the concept of coastal parks is considered in future planning as a means of enhancing coastal habitats and of integrating coastal (blue) infrastructure with green infrastructure.
<i>Strategic Policy GIP5</i>	
Adopt policies and measures at county level to protect, manage and plan landscapes through the provision of Landscape Classification and Character Assessments in accordance with adopted European (and contemporary National) Landscape Guidance Documents such as ‘Guidelines for the Implementation of the European Landscape Convention, February 2008’.	
GIR24	Develop a shared methodology and classification for Landscape Classification and Character Assessments (LACCA) in the Greater Dublin Area, through a multi disciplinary approach, identify short coming in existing landscape character assessments and GIS mapping data and update accordingly, carefully consider landscape character issues in the planning process and use LACCA to inform Historic Landscape Character Assessments (HLCA).
GIR25	Examination of suitable locations for designation of Special Amenity Area Orders within each Council area.
GIR26	Recognise the function and role of carbon sinks, heat sinks, soil management, and carbon sequestration in landscape management including forestry programmes and peat bog management.
GIR27	Expand the use of geological and soil mapping to inform planning decisions relating to settlement, flooding, food production value and carbon sequestration, to identify prime agricultural lands (for food production), degraded/contaminated lands (which may have implications for water quality, health, fauna), and those which are essential for habitat protection, or have geological significance.
GIR28	Use available GSI data and other reliable data sources to map landslide hazard areas, to inform SEA’s and EIS’s and formulate policies and responses to areas where landslide hazard is a known problem and promote awareness of landslide hazards through workshops, seminars and information publications.
<i>Strategic Policy GIP6:</i>	
To ensure the protection, enhancement and maintenance of the natural environment and recognise the economic, social, environmental and physical value of green spaces through the development of and integration of Green Infrastructure (GI) planning and development in the planning process.	
GIR29	Each Council should prepare a county based Green Infrastructure Strategy linking to adjoining areas and following regional connections, and implement GI strategies in local area plans and development management processes.
GIR30	GI development should be identified at the initial stages of all planning processes and included as a material consideration in order to inform future development.
GIR31	As part of the GI Strategy local authorities are recommended to carry out <ul style="list-style-type: none"> (i) A ‘stock take’ of existing data available, studies and survey works and identify areas for further work.

	(ii) Identify threats to habitats and green spaces as part of GI development and provide appropriate responses, obviation and mitigation measures as part of the process.
	(iii) Identify priority areas for investment and pilot projects, including long and short term objectives and have clear designation of responsibility of process ownership for delivery of particular aims.
	(iv) Engage with private landowners, relevant agencies (governmental and NGO's), community groups to build partnerships for development, delivery and maintenance of green infrastructure strategies and action plans.
	(v) Adhere to the provisions of Article 6 of the Habitats Directive and promote ecological coherence of the Natura 2000 network, in accordance with Article 10 of the Habitats Directive.
GIR32	Councils should apply the principles of GI development and county GI strategies to inform the development management process in terms of the design and layout of new residential areas, business/industrial development and other relevant projects.
GIR 33	Recognise the importance and contribution of green infrastructure throughout the region for the maintenance of biodiversity and ensuring that the region will be able to, or be ecologically robust enough to, adapt and respond to climate change issues.
<i>Strategic Policy SIP1</i>	
That Local Authorities work with the relevant state agencies in ensuring that an integrated approach is taken to both planning for the communities who live within the GDA either in planning for growth, for change or regeneration in communities; that the needs of particular elements of society are identified and responded to and that the most vulnerable are valued as part of the community.	
<i>Strategic Policy SIP2</i>	
That quality of life forms a central part of planning policy in supporting good spaces, good places and that social activities and the arts form a core part in making good places.	
SIR1	The delivery of housing needs to follow sustainable models through avoiding low density car based development forms and be focussed on medium densities which will support and be integrated with a range of community facilities within accessible walking distances. Where lands are close to public transport nodes/stations or QBC corridors the density and connectivity of developments should directly support increased population being able to benefit from good transport links. (HDA mitigation see Appendix \$)
SIR2	Councils should require that all residential development be of high quality in design, layout and space provision, and create a mix of typologies and tenure within residential areas, inline with the Departmental Guidelines. ⁵
SIR3	Where significant new housing is proposed in an area or community, an assessment of need regarding schools provision should take place; and local area plans (and/or Development Plans or Master Plans) should designate new school sites at accessible, pedestrian friendly locations. (HDA mitigation see Appendix \$)
SIR4	Planning authorities should work with the health services with regard to provision for community based primary care centres and hospital care in key centres, supporting their integration into new and existing communities. (HDA mitigation see Appendix \$)
SIR5	Councils should continue to promote the integration of quality childcare facilities in newer communities, in line with the Department Guidelines on childcare facilities.

⁵ [Guidelines for Planning Authorities on Sustainable Residential Development in Urban Areas; Quality Homes for Sustainable Communities; Delivering Homes, Sustaining Communities and Design Standards for New Apartments, and any subsequent documents or revised versions of the above.](#)

SIR6	Plans and projects associated with the provision of social infrastructure, recreation, leisure and tourism activities that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.
SIR7	Identify the importance of the development of recreational and leisure programmes and facilities in a balanced fashion across the GDA, where facilities are planned and provided for appropriate to the local community needs. It is recommended that an audit of recreational facilities with the purpose of identifying needs and new policy direction is undertaken prior to commencing a review of the County/City or Town Development Plan. ⁶ (HDA mitigation see Appendix \$)
SIR8	That the role of Arts and Culture in supporting sustainable and multi-faceted communities is recognised and that arts and culture facilities throughout the regions are promoted and are accessible to the communities they serve.
SIR9	That Development Plans and Local Area Plans are prepared so that important issues of social inclusion, ethnicity, minority groups and those with disabilities are fully considered and that social inclusion forms part of considering the policies set out for the growth and development of the Council area for the future.
<i>Strategic Policy FPI</i>	
That flood risk be managed pro-actively at all stages in the planning process avoiding development in flood risk areas where possible and by reducing the causes of flooding to and from existing and future development.	
FR1	New development should be avoided in areas at risk of flooding. Alongside this, the Regional Flood Risk Appraisal recognises the need for continuing investment and development within the urban centres of flood vulnerable designated growth towns and the City and for this to take place in tandem with the completion of CFRAM Studies and investment in comprehensive flood protection and management. (HDA mitigation see Appendix \$)
FR2	Development and Local Area Plans should include a Strategic Flood Risk Assessment and all future zoning of land for development in areas at risk of flooding should follow the sequential approach set out in the Departmental Guidance on Flood Risk Management. All Flood Risk Assessments and FRAM studies should take place in coordination and consultation with adjoining local authorities and regions.
FR3	Local authorities should take the opportunities presented to optimise improvements in biodiversity and amenity when including policies and actions in development plans / LAPs (such as flood plain protection and SuDS) for existing and future developments.
FR4	Plans and projects associated with flood risk management that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance.

⁶ Plans and projects that have the potential to negatively impact on Natura 2000 sites will be subject to a Habitats Directive Assessment (HDA) according to Article 6 of the habitats directive and in accordance with best practice and guidance

Appendix D

**Assessment Stage 3 -
Final Drafts RPGs -
Matrix**

RPG Strategic Policies & Recommendations	SEA Environmental Objectives								Comment
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets	
Economic Strategy									
Economic Policy EP1	P	P	P	P	P	P	P	P	
Economic Policy EP2	P	P	P	P	P	P	P	P	EP2 added subsequent to environmental workshops
Strategic Recommendations:									
ER1	P	P	P	P	P	P	P	P	
ER2	P	P	P	P	P	P	P	P	
ER3	P	P	P	P	P	P	P	P	
ER4	P	P	P	P	P	P	P	P	
ER5	P	P	P	P	P	P	P	P	Mention DCU and DIT
ER6	P	P	P	P	P	P	L	P	Change wording from wind farms to wind energy. If impact on Natura 2000, an HDA will be required.
ER7	P	P	P	P	P	P	L	P	
ER8	P	P	P	P	P	P	P	P	Define better "Green Economy" - e.g. For example, low carbon in terms of energy, low water consumption in terms of water and so on
ER9	P	P	P	P	P	P	P	P	
ER10	P	P	P	P	P	P	P	P	IDA/SDZ have already considered environmental resource requirement
ER11	P	P	P	P	P	P	L	P	
ER12	P	P	P	P	P	P	P	P	
ER13	P	P	P	P	P	P	P	P	Remove word "in the GDA"
ER14	P	P	P	P	P	P	P	P	
ER15	P	P	P	P	P	P	P	P	Change wording to "for commerce"
ER16	P	P	P	P	P	P	P	P	Include word "Seek proactively the delivery" "of a sustainable water supply"... And "including waste management"
ER17	P	P	P	P	P	P	P	P	
ER18	P	P	P	P	P	P	P	P	ER18 added subsequent to environmental workshops
Settlement Strategy									
Strategic Policy SP1	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
SR1	P	P	P	P	P	P	P	P	
SR2	P	P	P	P	P	P	P	P	
SR3	P	P	P	C	P	P	P	P	
SR4	P	P	P	C	P	P	C	C	Detailed local areas plans should seek to avoid developing areas of high sensitivity within the zoned lands. Also prioritise developing on serviced and sequential land. Changed landscape to uncertain.
SR5	P	P	P	P	P	P	P	P	
SR6	P	P	P	P	P	P	P	P	Material Assets - Changed from major negative to minor negative. The AA of the LAP will identify the potential impacts and mitigate appropriately. Change wording "plans and projects that have potential to negatively impact on Natura 2000 sites will be subject to a HDA according to Article 6 of the Habitats Directive and in accordance with best practice and guidance.
Rural Development									
Strategic Policy RP1	P	P	P	P	P	P	P	P	
Strategic Policy RP2	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
RR1	P	P	P	P	P	P	P	P	Councils should promote high quality design incorporating sustainable design
RR2	P	P	P	P	P	P	C	C	Councils should promote high quality design incorporating sustainable design
RR3	P	P	P	P	P	P	P	P	Councils should bring forward by-laws for the provision and management of septic tanks IWWTP. Refer to EPA Code of Practice: Wastewater Treatment and Disposal Systems Serving Single Houses (p.e. < 10)", 2009. Principal reason is the protection of group water schemes.
RR4	P	P	P	P	P	P	P	P	
RR5	P	P	P	P	P	P	P	P	
RR6	P	P	P	P	P	P	P	P	
RR7	P	P	P	P	P	P	P	P	Sustainable development requires the use of aggregates, However as quarries require an EIA, environmental impact is addressed at application stage. Changed water resources to major negative. Recognise local impacts but assessment is at a regional level.
RR8	P	P	P	P	P	P	P	P	EP18 added subsequent to environmental workshops

RPG Strategic Policies & Recommendations	SEA Environmental Objectives									Comment
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets		
SIR5	P	P	P	P	P	P	P	P	P	
SIR6	P	P	P	P	P	P	P	P	P	SIR6 added subsequent to environmental workshops, following SIRs numbering adjusted accordingly
SIR7	P	P	P	P	P	P	P	P	P	Add footnote to include HDA. SIR6 created as a result.
SIR8	P	P	P	P	P	P	P	P	P	
SIR9	P	P	P	P	P	P	P	P	P	
Flood Risk Appraisal										
Strategic Policy FP1	P	P	P	M	P	P	M	P	P	
Strategic Recommendations:										
FR1	P	P	P	P	P	P	M	P	P	
FR2	P	P	P	P	P	P	P	P	P	
FR3	P	P	P	P	P	P	P	P	P	A new FR should be included talking into account the Habitats Directive. FR4 created as a result.
FR4	P	P	P	P	P	P	P	P	P	FR4 added subsequent to environmental workshops.

			RPG Strategy																		
			Economic Strategy		Settlement Strategy	Rural Development		Physical Infrastructure					Green Infrastructure, Heritage & Environment						Social Infrastructure		Flood Risk Appraisal
			EP1	EP2	SP1	RP1	RP2	PIP1	PIP2	PIP3	PIP4	PIP5	GIP1	GIP2	GIP3	GIP4	GIP5	GIP6	SIP1	SIP2	FR1
RPG Strategy	Economic Strategy	EP1		P & C	P & C	P	P	P	P	P	P	L	P	P	P	P	P	P	P	P	
		EP2			P & C	P	P	P & C	P & C	P & C	P & C	P & C	L	P	P	P	P	P	P	P	
	Settlement Strategy	SP1				P	P	P	P	P	P	L	P	P	P	P	P	P	P	P	
	Rural Development	RP1					P & C	P	P	P	P	L	P	P	P	P	P	P	P	P	
		RP2							P	P	P	P	P	P	P	P	P	P	P	P	
	Physical Infrastructure	PIP1							P	P	P	P	P	P	P	P	P	P	P	P	P
		PIP2								P & C	P	P	P	P	P	P	P	P	P	P	P
		PIP3									P	P	P	P & C	P & C	P	P	P	P	P	P & C
		PIP4										P	P	P	P	P	P	P	P	P	P
		PIP5											P	P	P	P	P	P	P	P	P
	Green Infrastructure, Heritage & Environment	GIP1											P	P	P	P	P	P	P	P	P
		GIP2													P & C	P & C	P & C	C	P	P	P & C
		GIP3														P & C	P & C	P	P	P	P & C
		GIP4															P & C	P & C	P	P	P & C
		GIP5																P & C	P & C	P	P
GIP6																		P	P	P & C	
Social Infrastructure	SIP1																		P	P & C	
Flood Risk Appraisal	FR1																				

Strategies highlighted in red were added subsequent to environmental workshops.

Key:

Duration and Type of	
S	Short-term
M	Medium-term
L	Long-term
P	Permanent
T	Temporary
C	Cumulative
Significance of	
Major positive	
Positive	
Neutral	
Negative	
Major negative	
Uncertain	

Appendix E

**Assessment Stage 4 -
Post Consultation
Revised RPGs Memo
and Matrices**

To	Walter Foley Deirdre Scully	Reference number D6406-40/CB
cc	Carmel Brennan Richard Nairn	File reference
From	Conor Buggy x 4253 (Dublin) Joyanne Manning Joanne Treacy	Date 30 April 2010
Subject	Strategic Environmental Assessment of the Updated and Additional RPG Policies	

1 INTRODUCTION

As part of the ongoing strategic environmental assessment of the review of the Regional Planning Guidelines, this memo outlines the environmental review of public consultation responses, further environmental assessment of the updated guidelines that arose from the consultation process and the progress towards finalising the SEA Environmental Report and Statement.

2 PROCESS

2.1 Consultation Response Review

A total of eighty-seven (87) responses were received from the public consultation process. Of that eighty-seven, six (6) were directly relevant to the SEA Environmental Report, while the other submissions also had further information / suggestions for modification of the RPGs policies and strategic recommendations which could influence the sustainable development of the GDA's environment. The six responses directly related to the SEA covered a wide range of environmental issues and were submitted by the following organisations;

- Environmental Protection Agency;
- Department of Environment Heritage and Local Government;
- Dublin City Council;
- Wicklow Town Council;
- Institute of Public Health;
- Bremore Port.

Upon review of the public consultation information pertaining to the SEA process, Arup provided a summary response to the RPG development team about the modifications and additional information that will be incorporated into the SEA Environmental Report as a response to public consultation. The Environmental Report will require some additional information in the baseline assessment and further consideration of strategic environmental impacts arising from the final iteration of the development of the RPG policies and recommendations. This will necessitate an update of the environmental matrix and further revision of the environmental indicators, targets and monitoring.

2.2 2nd Environmental Workshop

The RPG development team revised the RPG policies and recommendations where necessary and prudent to incorporate input from the public consultation process. These revised policies and recommendations were submitted to the SEA and AA teams for assessment. A second environmental workshop was held in April 2010 to discuss the revised policies and recommendations. The workshop was conducted with the SEA, AA and RPG development teams and all environmental issues regarding the updated policies and recommendations were discussed. This resulted in a further iterative revision of the policies and recommendations to ensure sustainable development of the GDA.

3 ENVIRONMENTAL ASSESSMENT

3.1 Revised RPG Policies

Modification of RPG policies in response to public consultation has in no way negatively altered their potential environmental impacts. Essentially the revision of the policies ensured that they were as sustainable and as environmentally cognisant as possible. Rewording and addition of supplementary text to strategic policies is not considered to have materially altered the environmental assessment conducted for the environmental report.

The significant revision and updating of the climate change policy is considered to be environmentally practicable and ensures that a wide range of environmental legislation concerning climate change and sustainability will be promoted within the GDA and incorporated into the development plans which will direct the sustainable development of the region.

3.2 Revised RPG Recommendations

Accompanying the revision of the RPG policies, the iterative revision of their associated strategic recommendations also resulted in their modification in response to public consultation input. The SEA and AA teams reviewed the revised recommendations and discussed any amendments with RPG team at the environmental workshop. The revision of a range of recommendations was not considered to have any significant negative impacts on the GDAs environment. Revision, rewording and the introduction of additional text to recommendations provided greater emphasis on sustainability and integration of environmental policy into the continuous development of the GDA. Development plans arising from the strategies laid out in the RPGs will consequently, by necessity, need to be more environmentally robust to comply with the RPG recommendations.

3.3 Additional RPG Recommendations

Four new additional RPG recommendations have been created by the RPG team in response to the public consultation input and the corresponding revision of strategic policies. These new strategic recommendations were initially assessed by the SEA and AA teams at the environmental workshop. Further revision was made by the RPG team in response to the environmental input and the final four recommendations were then designated for assessment.

The additional recommendations are outlined below;

- **CLIP1:** While recognising the broad extent of processes which impact on the dynamics of climate change, planning authorities, in so far as possible, should nonetheless seek to provide for the integration of climate change considerations, based on best scientific evidence, into all policy areas relevant to them, including development plans, flood risk assessments, biodiversity and heritage plans and application of relevant particulars of

associated plans and projects such as the River Basin Management Plans and ICZM. The development of Local Climate Change Strategies and/or associated Energy Action Plans by the local authorities is supported by the Regional Planning Guidelines.

- **RR4:** Rural public transport and connectivity to larger urban settlements and higher tier services should be considered as part of the sustainable development of rural areas.
- **GIR34:** Local authorities shall, on the basis of cooperation with landowners, recreational users and other relevant stakeholders, take a positive approach to the promotion of agreed and managed access in the countryside for people, including agreed and managed walking/cycling routes. The feasibility of such access provisions and routes shall be informed by legislative responsibilities to designated sites of special amenity, ecological sensitivities and heritage value and shall be delivered on the basis of sustainability, consultation and consensus building.
- **PIR38:** Waste management facilities should be appropriately managed and monitored according to best practice to maximise efficiencies and to protect human health and the natural environment.

These recommendations are assessed against the environmental objectives stipulated in the Environmental Report using the criteria laid out in Table 3.1.

Table 3.1 Impact Ratings

Duration and Type of Impact	
S	Short-term - Impact lasting one to seven years
M	Medium-term - Impact lasting seven to fifteen years
L	Long-term - Impact lasting fifteen to sixty years
P	Permanent - Impact lasting over sixty years
T	Temporary - Impact lasting for one year or less
C	Cumulative – Impact that is ameliorated by other impacts
Significance of Impact	
	Major positive
	Positive
	Neutral
	Negative
	Major negative
	Uncertain

Please see Table 3.2 below outlining the environmental matrix for these four recommendations.

Table 3.2 Additional Recommendations Environmental Assessment

RPG Strategic Policies & Recommendations	SEA Environmental Objectives							
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets
CLIP1	P	P	P	P	P	P	P	P
RR4	P	P	P	P	P	P	P	P
GIR34	P	P	P	P	P	P	P	P
PIR38	P	P	P	P	P	P	P	P

- **CLIP4** will have a positive effect on all aspects of the environment. It is considered to have a neutral effect on Soils and Geology whereas it should have a major positive effect on Water Resources, Air and Climate and correspondingly Human Health. The promotion of climate change policy which will directly feed into flood risk strategy and river basin management will ensure that the GDAs landscape, cultural heritage, infrastructural assets and biodiversity will be afforded a greater level of future proofing against climate change.
- **RR4** in general is expected to have a neutral and permanent impact on the GDAs environment. While the development of rural transport will have a very positive impact for the rural community, provide a greater level of connectivity and potentially reduce GHG emissions through the reduction of private transport, the general effects on the environment will be minimal and should have little or no impact once mitigated appropriately at the project level.
- **GIR34** will provide greater and managed access to the countryside for the community of the GDA. It is essential that this access is managed appropriately to ensure environmental integrity. It is considered that this will have a permanent positive impact on the regions biodiversity as it will increase public awareness of the regions inherent ecological heritage which will promote its protection. In turn there will be positive impacts associated with this for the GDAs community wellbeing, cultural heritage and as an asset for tourism.
- **PIR38** promoting the sustainable development, management and continuous monitoring of waste management facilities necessary for the GDA has inherent positive impacts for the GDAs community and their health and provide valuable environmentally managed facilities for the region. Appropriate waste management practices will ensure that the recycling of C+D materials will minimise impact on the regions geological heritage and will be a positive impact for this resource. The provision of appropriately managed waste management facilities is essential for the sustainable development of the GDA.

4 TOWARDS THE SEA STATEMENT

The environmental report will be updated and finalised to incorporate observations on the SEA that arose from public consultation and the iterative process between the SEA, AA and RPG teams. The penultimate iteration of the RPGs is now being finalised and presented to the local authorities for final approval. Once the final comments have been received the RPG policies and recommendations will be finalised and the Environmental Report will be issued.

The SEA Statement will be compiled upon finalisation of the environmental report. The SEA Statement will outline how environmental considerations were included throughout the development of the review of the RPGs and how the input from the two consultation periods was incorporated into the environmental assessment process.

Appendix F

**Assessment Stage 5 -
Directors Motions on
RPGs - Memo and
Matrix**

To	Deirdre Scully Walter Foley	Reference number D6406/40/CB
cc	Carmel Brennan	File reference
From	Conor Buggy x 4253 (Dublin) Joyanne Manning Joanne Treacy	Date 14 June 2010
Subject	Initial Environmental Assessment of Directors Report Motions	

1 Introduction

This memo outlines the environmental assessment of the proposed motions arising from the Directors Report for the RPGs. Each motion has been assessed from an overall environmental perspective and commentary provided for each motion.

2 Environmental Assessment

Chapters 1, 3, 4, 5, 6, 7, 8 and 10 received updated motions for alterations to the guidelines. These motions are assessed in the following subsections from an overall environmental perspective.

2.1 Chapter 1

2.1.1 Motion 1.1

No environmental issues arise from the motion.

2.1.2 Motion 1.2

This motion promotes inter-regional sustainability which will lead to greater overall national sustainability endeavours and can thus be considered environmentally positive.

2.2 Chapter 3

2.2.1 Motion 3.1

There are potential negative impacts associated with the expansion of Kildare Town beyond the strategy envisioned in the RPGs. There are potential negative impacts to biodiversity, cultural heritage and infrastructural resources. It is recommended that this motion is not passed.

2.2.2 Motion 3.2

Inter-regional development arising from this corridor may ultimately have a positive environmental impact provided that growth is sustainable and incorporates environmental mitigation. However, it should be noted that the area between Fingal and Drogheda is considered to be rural and growth of the urban hinterland in this rural setting must be appropriately controlled and zoned for. There is the potential for significant negative environmental impacts should inappropriate development take place in this rural area.

2.2.3 Motion 3.3

There are no significant strategic environmental issues arising from this motion.

2.3 Chapter 4

2.3.1 Motion 4.1

This motion provides for sustainable development through remediation of brownfield sites and consolidation of existing land uses which reduces potential landtake which is ultimately environmentally positive.

2.3.2 Motion 4.2

This motion recognises the current economic and social conditions within the region which are ultimately associated with potential changes to the environment. Accurate and up to date data ensures a robust decision making process. This motion is positive and supports the sustainable development of the region through an ongoing review process which will assist in highlighting potential environmental issues. However, there are no significant strategic environmental issues arising from this motion.

2.3.3 Motion 4.3

This motion is considered to be environmentally negative and unsustainable. This motion is in conflict with the environmental objectives outlined in the environmental report and contrary to the sustainable development of the region as a unified entity.

It is recommended that this motion is not passed from an environmental perspective.

2.4 Chapter 5

2.4.1 Motion 5.1

There are potential negative impacts associated with forestry on water systems if managed inappropriately. Conversely, there are also positive impacts associated with biodiversity, climate and amenity potential. The recommendation for amendment to the RPGs is suitably considered to ensure sustainable development of forestry which will incorporate measures to control potential pollution to negate potential environmental impacts.

2.4.2 Motion 5.2

Stipulating farmers solely as custodians of the natural environment excludes foresters, aquaculturalists and fishermen as custodians of the natural environment. From an environmental perspective the original wording of the RPGs is the most appropriate.

2.5 Chapter 6

2.5.1 Motion 6.1

There are no significant strategic environmental issues arising from this motion given that this motion is a text change. The overall objective of this motion is to ensure that appropriate environmental optioneering shall take place to allow for inclusion of environmental considerations in the ultimate siting of the plant.

2.5.2 Motions 6.2 and 6.3

This motion is environmentally positive as it will lead to a reduction of potable water loss and reduce potential impacts to groundwater. For regional water resources this motion offers greater focus on sustainability.

2.5.3 Motion 6.4

It is considered that this motion is environmentally positive as it will reduce pressure on existing water resources. However, appropriate environmental optioneering and impact assessment must take place for such a development.

2.5.4 Motion 6.5

Tertiary treatment is positive for the environment. However, the development of the plant will ultimately be determined by the Environmental Protection Agency and will follow best practices as prescribed by that body.

2.5.5 Motion 6.6

This motion would be positive for the environment of the GDA. However it is up to the Environmental Protection Agency to determine potential usage of discharges as part of their licensing procedures.

2.5.6 Motion 6.7

This motion is supported from an environmental perspective as it promotes efficient usage of the waste hierarchy by ensuring adequate infrastructure is provided for waste separation and recycling within new development.

2.5.7 Motion 6.8

There are no significant strategic environmental issues arising from this motion given that this motion is a text change. All transportation modes require appropriate environmental assessment. This motion is therefore supported from an environmental perspective.

2.5.8 Motion 6.9

There are no significant strategic environmental issues arising from this motion at a regional level given that this motion is a text change. Future provision of airport infrastructure must be environmentally assessed at the appropriate level in line with planning and environmental legislation.

2.5.9 Motion 6.10

This motion is not considered to have any significant environmental impacts at a regional level. Future provision of rail infrastructure must be environmentally assessed at the appropriate level in line with planning and environmental legislation.

2.5.10 Motion 6.11

This motion supports sustainable growth and will be positive for social and economic infrastructure.

2.5.11 Motions 6.12, 6.13 and 6.14

Environmental Constraints and Route Optioneering Reports are essential for the planning stages of such an infrastructural project. These reports will address issues such as scale and capacity. Mitigation of environmental impacts is managed in the environmental impact assessment process and ultimately incorporated into the final design and layout. Ultimately such infrastructure would have positive impacts for the GDA in general especially for social and economic reasons.

2.6 Chapter 7

2.6.1 Motion 7.1

This motion is not considered to be of strategic regional importance. Local authorities should coordinate at a county level the appropriate management of the Liffey Valley given its environmental sensitivity to ensure its status. The suggested motion has the potential for negative environmental impacts.

2.6.2 Motion 7.2

The promotion of integrated green space is positive for the regions environment, enables both the protection of biodiversity and provides amenity space within metropolitan areas,

2.6.3 Motion 7.3

While supporting the sustainable use of the regions natural environment as an amenity, this motion is not considered to be an overriding regional issue. It would be more appropriate to deal with this issue at a county level.

2.6.4 Motion 7.4

This motion is not considered to have any significant environmental issue. The current wording of the RPGs regarding rights of way is appropriate from an environmental perspective.

2.6.5 Motion 7.5

This is a significant positive motion for the protection and enhancement of coastal resources and supports the regions sustainable development.

2.6.6 Motion 7.6

There are no significant environmental issues associated with this motions proposed alteration to the RPGs given that this motion is a text change.

2.6.7 Motion 7.7

The overall objective of this motion has positive environmental impacts for social activities of the regions community.

2.6.8 Motion 7.8

This motion has positive environmental implications for coastal protection and sustainable development.

2.6.9 Motion 7.9

This has potentially significant negative environmental implications for the protected ecological coastal areas of Dublin and Wicklow (Natura 2000 sites). Should this RPG be amended, there could be significant environmental impacts which will need to be mitigated.

Should Bray to Balbriggan proceed as a plan it will require its own SEA and AA to assess the potential environmental impact.

2.6.10 Motion 7.10

This motion is environmentally positive for the cultural heritage and amenity value of the region.

2.6.11 Motion 7.11

This motion supports greater amenity value for the coastline which has positive social impacts for the community when appropriately and sustainable managed (if inappropriately managed, negative environmental impacts could arise).

2.6.12 Motion 7.12

This motion is slightly more positive from an amenity perspective. Access to scenic areas needs to be managed appropriately to avoid potential negative impacts. However, it is considered that the current wording of the RPGs is acceptable and does not require alteration.

2.6.13 Motion 7.13

While this motion is considered to be slightly positive from a cultural heritage perspective, this motion is a county level issue rather than a regional issue.

2.6.14 Motion 7.14

This motion is not considered to be regionally orientated in nature but does have locally positive impacts for cultural heritage.

2.6.15 Motion 7.15

The RPGs have provided sufficient detail to environmentally assess this issue. This motion does not materially alter the existing environmental assessment given that this motion is a text change.

2.7 Chapter 8

2.7.1 Motions 8.1 and 8.2

This motion is considered to be positive for social amenity but potentially negative for biodiversity. This is also considered to be a local issue rather than a regional issue and should be dealt with at local authority level.

2.7.2 Motion 8.3

The revision of the RPGs to reflect these motions will lead to potential environmentally positive impacts.

2.7.3 Motion 8.4

This motion is very positive for social amenity and will be a positive impact for the GDAs community.

2.8 Chapter 10

2.8.1 Motions 10.1 and 10.2

Accurate and up to date data ensures a robust decision making process. These motions are positive and support the sustainable development of the region through an ongoing review process which will assist in highlighting potential environmental issues. However, there are no significant strategic environmental issues arising from these motions.

3 Assessment Evolution

The SEA team will provide a more detailed appraisal of these motions assessed against the environmental objectives which will include matrices similar to those found in the Environmental Report.

These matrices will ultimately be incorporated into the final environmental report and the process outlining the evolution of the environmental assessment at each stage of the development of the RPGs will be contained within the SEA Statement.

RPG Directors Motions	SEA Environmental Objectives							
	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets
1.1	Green	Green	Green	Green	Green	Green	Green	Green
1.2	Green	Blue	Green	Blue	Blue	Green	Green	Blue
3.1	Pink	Green	Pink	Yellow	Green	Pink	Yellow	Pink
3.2	Pink	Blue	Pink	Pink	Pink	Pink	Pink	Blue
3.3	Green	Green	Green	Green	Green	Green	Green	Green
4.1	Green	Blue	Blue	Blue	Green	Yellow	Blue	Dark Blue
4.2	Green	Blue	Green	Blue	Green	Green	Green	Blue
4.3	Pink	Pink	Yellow	Red	Pink	Yellow	Red	Red
5.1	Dark Blue	Blue	Green	Pink	Blue	Green	Blue	Blue
5.2	Green	Green	Green	Green	Green	Green	Green	Green
6.1	Green	Green	Green	Green	Green	Green	Green	Green
6.2 / 6.3	Green	Blue	Green	Dark Blue	Green	Green	Green	Dark Blue
6.4	Yellow	Blue	Yellow	Dark Blue	Green	Yellow	Yellow	Dark Blue
6.5	Dark Blue	Dark Blue	Green	Dark Blue	Green	Green	Green	Dark Blue
6.6	Dark Blue	Green	Green	Blue	Blue	Green	Green	Green
6.7	Green	Blue	Blue	Green	Green	Green	Green	Blue
6.8	Green	Green	Green	Green	Green	Green	Green	Green
6.9	Green	Green	Green	Green	Green	Green	Green	Green
6.10	Green	Green	Green	Green	Green	Green	Green	Green
6.11	Green	Blue	Green	Green	Green	Green	Green	Dark Blue
6.12 / 6.13 / 6.14	Yellow	Blue	Yellow	Yellow	Yellow	Yellow	Yellow	Dark Blue
7.1	Pink	Pink	Pink	Pink	Green	Pink	Pink	Blue
7.2	Blue	Blue	Green	Green	Green	Blue	Blue	Blue
7.3	Green	Blue	Green	Green	Green	Green	Green	Green
7.4	Green	Blue	Green	Green	Green	Green	Green	Green
7.5	Dark Blue	Blue	Green	Blue	Blue	Blue	Blue	Blue
7.6	Green	Green	Green	Green	Green	Green	Green	Green
7.7	Green	Blue	Green	Green	Green	Green	Green	Green
7.8	Blue	Blue	Blue	Green	Green	Blue	Blue	Dark Blue
7.9	Pink	Blue	Yellow	Yellow	Green	Yellow	Yellow	Blue
7.10	Green	Green	Green	Green	Green	Dark Blue	Green	Green
7.11	Green	Blue	Green	Yellow	Green	Green	Green	Green
7.12	Green	Blue	Green	Green	Green	Green	Green	Green
7.13	Green	Green	Green	Green	Green	Dark Blue	Green	Green
7.14	Green	Green	Green	Green	Green	Green	Green	Green
7.15	Green	Green	Green	Green	Green	Green	Green	Green
8.1 / 8.2	Pink	Blue	Green	Pink	Green	Green	Pink	Green
8.3	Green	Blue	Green	Green	Green	Green	Green	Blue
8.4	Green	Dark Blue	Green	Green	Green	Green	Green	Green
10.1 / 10.2	Green	Blue	Green	Blue	Green	Green	Green	Blue

Appendix G

**Final Environmental
Assessment Matrix**

	Biodiversity, Flora & Fauna	Population & Human Health	Soils & Geology	Water Resources	Air & Climate	Cultural Heritage	Landscape	Material Assets	Comment
Physical Infrastructure									
Strategic Policy PIP1	P	P	P	P	P	P	L	P	EIA will examine issues at project level. SEA of county development plans should initially identify any issues and potential impacts for road and rail.
Strategic Policy PIP2	P	P	P	P	P	P	P	P	
Strategic Policy PIP3	P	P	P	P	P	P	P	P	
Strategic Policy PIP4	P	P	P	P	P	P	P	P	This assumes significant investment in renewables
Strategic Policy PIP5	P	P	P	P	P	P	P	P	
Strategic Recommendations:									
PIR1	P	P	P	P	P	P	P	P	
PIR2	P	P	P	P	P	P	P	P	
PIR3	P	P	P	P	P	P	P	P	
PIR4	P	P	P	P	P	P	L	P	SEA of the DTA plan will identify their environmental issues.
PIR5	P	P	P	P	P	P	L	P	
PIR6	P	P	P	P	P	P	P	P	
PIR7	P	P	P	P	P	P	L	P	Improvements in aircraft emissions will reduce the impact on climate and human health.
PIR8	P	P	P	C&L	C&P	P	L	C&P	
PIR9	P	P	P	P	P	P	P	P	
PIR10	P	P	P	P	P	P	P	P	
PIR11	P	P	P	P	P	P	P	P	
PIR12	P	P	P	P	P	P	P	P	Updated post consultation
PIR13	P	P	P	P	P	P	P	P	
PIR14	P	P	P	P	P	P	P	P	
PIR15	P	P	P	P	P	P	P	P	
PIR16	P	P	P	P	P	P	P	P	
PIR17	P	P	P	C	P	P	P	P	Detailed SEA and EIA will identify environmental impacts and mitigation.
PIR18	P	P	P	P	P	P	P	P	
PIR19	P	P	P	P	P	P	P	P	
PIR20	P	P	P	P	P	P	P	P	
PIR21	P	P	P	P	P	P	P	P	
PIR22	P	P	P	P	P	P	P	P	
PIR23	C	C	P	C	P	P	P	C	Uncertain as wording says "address the relationship" as opposed to protect, minimise, etc.. Change wording to "between significant land, arterial drainage and navigation" and "...possible impact to protect and where appropriate minimise possible impact on both large"
PIR24	P	P	P	P	P	P	P	P	Addition at the final stage of approval post consultation.
PIR25	P	P	P	P	P	P	P	P	Uncertain due to lack of knowledge of siting and types of technologies. Project specific impacts will be addressed though EIA as appropriate.
PIR26	P	P	P	P	P	P	P	P	The policy outlines that plans and policies should support the targets for renewable energy so that renewable energy targets for 2020 are met. However, the lifespan of these guidelines are 2022. The recommendation should therefore be reworded to recognise further targets that may come on board during the lifetime of this plan.
PIR27	P	P	P	P	P	P	P	P	Through consultation with the EPA sustainable renewable energy was included in text.
PIR28	P	P	P	P	P	P	P	P	On assumption that mitigation measures are followed in the noted guidance documents.
PIR29	P	P	P	P	P	P	P	P	Arose post consultation.
PIR30	P	P	P	P	P	P	P	P	
PIR31	P	P	P	P	P	P	P	P	
PIR32	P	P	P	P	P	P	P	P	Addition at the final stage of approval post consultation.
PIR33	P	P	P	P	P	P	P	P	Addition at the final stage of approval post consultation.
PIR34	P	P	P	P	P	P	P	P	Addition at the final stage of approval post consultation. Appropriate siting of projects will be key to ensure the reduction of potential environmental impacts.
PIR35	P	P	P	P	P	P	P	P	Addition through directors motions.
PIR36	P	P	P	P	P	P	P	P	
PIR37	P	P	P	P	P	P	P	P	
PIR38	P	P	P	P	P	P	P	P	Updated post consultation
PIR39	P	P	P	P	P	P	P	P	Updated post consultation
PIR40	P	P	P	P	P	P	P	P	Arose post consultation.
PIR41	P	P	P	P	P	P	P	P	Updated post consultation

		RPG Strategy																		
		Economic Strategy		Settlement Strategy	Rural Development		Physical Infrastructure					Green Infrastructure, Heritage & Environment						Social Infrastructure		Flood Risk Appraisal
		EP1	EP2	SP1	RP1	RP2	PIP1	PIP2	PIP3	PIP4	PIP5	GIP1	GIP2	GIP3	GIP4	GIP5	GIP6	SIP1	SIP2	FR1
RPG Strategy	Economic Strategy	EP1	P & C	P & C	P	P	P	P	P	P	L	P	P	P	P	P	P	P	P	
		EP2		P & C	P	P	P & C	P & C	P & C	P & C	P & C	L	P	P	P	P	P	P	P	
	Settlement Strategy	SP1			P	P	P	P	P	P	L	P	P	P	P	P	P	P	P	
	Rural Development	RP1				P & C	P	P	P	P	P	L	P	P	P	P	P	P	P	
		RP2					P	P	P	P	P	P	P	P	P	P	P	P	P	
	Physical Infrastructure	PIP1						P	P	P	P	P	P	P	P	P	P	P	P	
		PIP2							P & C	P	P	P	P	P	P	P	P	P	P	
		PIP3								P	P	P	P & C	P & C	P	P	P	P	P	
		PIP4								P	P	P	P	P	P	P	P	P	P	
		PIP5									P	P	P	P	P	P	P	P	P	
	Green Infrastructure, Heritage & Environment	GIP1											P	P	P	P	P	P	P & C	
		GIP2												P & C	P & C	P & C	C	P	P & C	
		GIP3													P & C	P & C	P	P	P & C	
		GIP4														P & C	P & C	P	P & C	
GIP5																P & C	P	P & C		
GIP6																	P	P & C		
Social Infrastructure	SIP1																	P & C		
	SIP2																			
Flood Risk Appraisal	FR1																			

Strategies highlighted in red were added subsequent to environmental workshops.

Key:

Duration and Type of	
S	Short-term
M	Medium-term
L	Long-term
P	Permanent
T	Temporary
C	Cumulative
Significance of	
Major positive	
Positive	
Neutral	
Negative	
Major negative	
Uncertain	