Relational attributes of political entrepreneurs: a network perspective

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ABSTRACT Political entrepreneurs are identified by personal characteristics similar to economic entrepreneurs, i.e. intellectual ability, good knowledge of their domain, team building skills, reputation, extensive networks, strategic vision and tenacity. Political entrepreneurs differ from economic agents by having a different incentive structure in attempting to control or exercise political power. A complete model of actor interaction would entail structural constraints and agency attributes coupled with an account of actor relational data. These we can best conceptualize as network data. Networks provide the context within which these actors thrive. Furthermore, as all entrepreneurial activity bears risks, networks are employed to mitigate them. Furthermore, accepting the premise that political entrepreneurs are network-dependent implies that their ability for political action is network-contingent. Focusing on their network attributes, I attempt to identify those significant for the entrepreneurial behaviour of policy actors. A case study of agenda-setting among policy entrepreneurs provides the background for testing two alternative hypotheses on whether these actors exhibit incremental or opportunistic behaviour.

KEY WORDS interest intermediation; policy-making; political entrepreneurs; political networks.

POLITICAL ENTREPRENEURS: AGENTS WITHIN POLITICAL STRUCTURE

Political and social agents are often described as ‘entrepreneurial’. The term is used extensively and interchangeably in attempts to explain innovation in public life, successful policies or a successful political career. As is the case with misconceptions surrounding economic entrepreneurship, process is often confused with output. For all its misuse, the term contains an intuitive appeal for describing exceptional acts of presumably exceptional agents. We can build on classic economic definitions of entrepreneurship\(^1\) so that exceptional actors may be identified on the basis of some defining behavioural trait that would separate them from what may be considered normal behaviour within their milieu. Characteristics of relevance would include: (1) tenacity
and persistence in facing negative odds; (2) an ability to create or even invent opportunities; (3) a competitive spirit; (4) an ability to invent creative problem solutions; (5) strategic thinking combined with readiness for immediate action; and finally (6) the ability to thrive under uncertainty. In short these actors can respond to exceptional challenges and rise above their peers by means of their strategic forethought and ability to manipulate their environment.²

AN EMPIRICAL DEFINITION AND TWO HYPOTHESES OF POLITICAL ENTREPRENEURSHIP

Personal and positional attributes as well as structural and institutional constraints affect the ability of political actors to influence policy and therefore be ‘entrepreneurial’. A comprehensive model of their behaviour should include their contestation with other actors and an evaluation of the degree to which they engage in entrepreneurial acts.³ Networks measure relational ties, and uniquely allow for the integration of a structural dimension to agency roles. An actor’s network provides a framework within which the actor can project power, control information flows and attempt to influence political outcomes or other actors. A network approach therefore integrates structure within an agent’s actions by allowing for a more realistic view of the world where one is contingent on the other. The network perspective improves the potential for valid research on political entrepreneurs (PEs) as it deals with a fundamental weakness of the literature. We can identify exceptional political events (i.e. the introduction of a successful policy) and proceed to examine the network of actors associated with these as the context within which political agents are likely to exhibit exceptional political initiative. Bias associated with arbitrary selection of certain actors as entrepreneurial can be avoided, while at the same time an examination of the context and relational ties of all relevant actors can be attained.

A definition of political entrepreneurship is offered as a background to the empirical investigation that follows.⁴ Elements of socio-political structure are integrated with relational elements of political agency. A social network perspective is also integrated here with classic accounts of elite actor attributes.⁵ Political entrepreneurs, therefore, are actors with:

1. distinctive behavioural traits that affect their likelihood at political leadership and network brokerage roles;
2. a unique political utility function that determines the likelihood they will invest political capital in a particular policy or action;
3. specific socio-political constraints influencing their ability for political intervention;
4. unique relational attributes affecting their relative power (as political capital) and the control of information flows of their respective political networks.

These actors typically come to prominence by taking advantage of inefficiencies in political representation or public management. They invest political capital proportional to estimated opportunities and inversely proportional to their
estimation of related risks. They exercise power by either advising and influencing powerful other actors or dominating and exploiting weak other actors.

The focus of this article is not actor behavioural traits (1) that could be better investigated through psychometrics; nor an actor’s utility function (2) for which only assumptions can be ventured here. I concentrate instead on actor relational attributes (4) as revealed through their network of interactions, and actor institutional constraints (3) as revealed through the case study analysis.

Actors in the public domain are examined as they interact over the contestation of public policy. Evidence presented here suggests that a number of them are entrepreneurially attempting to re-formulate the policy agenda and affect the policy cycle. Based on previous research and the insights offered by the combination of a network and a policy analysis perspective, two hypotheses are offered here at opposing ends of the political entrepreneur literature. In the primary hypothesis entrepreneurs are incremental actors, possessing foresight, competitiveness, sharing values with their policy community6 and being prominent by their relative centrality within their issue network. This is a hypothesis close to the advocacy coalition framework assumptions (Sabatier 1998) as well as some assumptions in the rational choice literature, where entrepreneurs are often viewed as incremental game players (Arce 2001; Holcombe 2002). The alternative hypothesis views political entrepreneurs as opportunistic actors central in a network they engineer in order to promote a specific policy initiative. This is a hypothesis close to assumptions posed by those who view public entrepreneurs as innovating under uncertainty (Kuhnert 2001). These actors would be central to their network exhibiting persistency and good negotiating skills (Kingdon 1995).

RATIONAL POLICY ACTORS?

Political economists often prefer to examine political action within a rational choice model of political behaviour. PEs are assumed to exploit their followers as leaders who take ‘an action that throws a disproportionate share of the burden of collective action on the follower’ (Arce 2001: 125). Most opportunity for political entrepreneurship exists where the chance for political manipulation is the highest. Opportunities are assumed to appear at times of political change or transition. Change, by altering structures, creates opportunities and exposes inefficiencies in the provision of public goods. PEs, in this view, are those actors who perceive the opportunities for new political institutions or policies. A neo-liberal view of the state commanding a monopoly on coercion underlies an assumption that the state is a domain of constant misallocation of opportunities. The political entrepreneur operates in a political market where profit opportunities are permanently present and where there can be no equilibrium point. This is an inevitable outcome of ‘the forced transfer of resources from some to others’; where public utility may only improve if ‘the costs forced on the losers may be less than the gains to the gainers’ (Holcombe 2002: 143). In this view of the state inefficiencies persist due to ‘the incentive structure in
politics [that] leads political entrepreneurs towards actions that benefit some at the expense of others’ (ibid: 144). Such a view of political agency suffers from under-specification of public goods, public utility and agent incentive structures; misrepresentation of the role of political institutions in limiting allocation inefficiencies; misunderstanding the role of elite recruitment and elite competition; while assuming that actors are non-strategic, have no residual reputation and are engaged in a zero-sum game. So, often, a rational choice approach fails to produce a satisfactory account of these actors’ interaction. Furthermore, entrepreneurial behaviour is often confused with standard elite contest, elite circulation and elite recruitment roles.

For instance, the view has been expressed that PEs would favour evolutionary change in an attempt to ‘create political stability’ (Holcombe 2002: 152). This confuses political entrepreneurship with standard roles of political elites that do not necessarily have much to do with entrepreneurial behaviour. Such a view disregards the role PEs can play in inventing new policy domains and shaping the background conditions for ‘creative destruction’ of institutional space. Furthermore, to suggest that entrepreneurs may favour stability and attempt to retain their ‘profit advantage’ implies that they are at best being strategic but does not imply that they are being entrepreneurial. This points to a common error in considering an entrepreneurial actor as entrenched in an entrepreneurial role. It would be more accurate to look at individual actions as entrepreneurial and actors as holding the potential for entrepreneurial behaviour.

In policy-making, actors are constrained by the form and operation of inter-organizational decision-making and acceptable modes of policy control. Part of the literature on advocacy coalitions (Sabatier 1998) and policy network analysis (Knoke et al. 1996) deals with such constraints/opportunities. Misconceptions lie with the prolific ‘realist’ policy network school that has confused the debate. As Dowding (1995) has convincingly argued, the term ‘policy networks’ does not have an agreed-upon meaning and is not modelled consistently. Some of the most prominent proponents of the realist policy networks literature have eventually conceded that their use of the term is merely metaphorical (Marsh and Smith 2001: 535) or an attempt at a ‘dialectical model’ (Toke and Marsh 2003). This implies that by employing the term as a heuristic device we cannot predict or offer in-depth analysis of policy processes (Dowding 2001). Earlier influential research on the role of policy communities and issue networks in British government by some of the same authors (Marsh and Rhodes 1992) has successfully explored similar assumptions by maintaining a qualitative analysis. Borzel presents an eloquent example of an attempt at a typology that however demonstrates the weakness that can emanate from an equivocal definition (Borzel 1998: 254) and under-specification of the concept (1998: 261). According to Borzel, networks should be ‘conceptualised as informal institutions’ (1998: 263), a claim explicitly made as well by Hay and Richards who see ‘networks as dynamic institutional forms’ (2000: 25). Representing networks as institutions ignores the difference between a concept that defines actor relational attributes to one that delineates structural characteristics.
of institutional parameters. Instead of transcending the structure and agency debate, ‘realist’ policy networks unfortunately introduce a residual category for institutional parameters.12

FOCUSBING ON RELATIONAL ATTRIBUTES: THE ROLE OF POLITICAL NETWORKS13

How does accounting for their relational context improve our understanding of these actors’ role? Networks and political coalitions operate as mediating mechanisms of elite resource allocation and political capital distribution. Networks mitigate the risks undertaken by actors by cushioning the impact of erroneous or unfortunate decisions. Networks can also increase actor efficiency by providing broad and filtered information. Certain network structures allow actors more diverse resources than they could master on their own, but it is not only the information and resource allocation mechanisms of networks that affect entrepreneurial risk-taking. Networks can also allow the dissipation of responsibility among network members. Those who have (or appear to have) strong links with an actor will be sharing both costs and benefits relating to the risks they undertake. Risk mitigation could therefore be inducing higher risk-taking among networked actors. Overall networks can (1) facilitate coalition building; (2) ameliorate shocks from institutional transformation; (3) facilitate efficient sourcing and allocation of resources; (4) apply a filter to the information reaching actors; and (5) ameliorate risks and therefore lead to impunity of higher risk-taking.

Frequent reference to the relevance of networks for entrepreneurial action has been associated with the effects of networks on actor accumulation of social and political capital, actor reach, effective manipulation of resources and the manipulation of others.14 Network structure has also been reported to have an effect on decision-making, resource dissemination and policy innovation. I proceed below to examine the relevance of the network analysis literature on political entrepreneurs. The obvious point of departure is network centrality.

Network analysis is a cross-discipline methodological and theoretical tool that facilitates the examination of actors within their relational space. Mapping out an actor’s network of contacts, influence and information flows allows for the investigation of patterns in relationships that transcend mere examination of hierarchical structure and much improve our understanding of actors’ relative power. Network theorists have consistently researched the association between network centrality and actor power. Laumann and Pappi (1976) and Krackhardt (1990) among others have found a strong direct and positive relationship between power and centrality. Freeman (1979) has expanded this to suggest that centrality is multidimensional as a concept. Mizruchi and Potts in a literature review elucidate that ‘it is not centrality in general but rather certain forms of centrality that are predictive of an actor’s power’ (1998: 355). Burt, by introducing the structural holes theory, has suggested that ‘the structure of a network indicates the redundancy of its information
This theory can elucidate information flow benefits to actors and can offer a way of measuring brokerage benefits of entrepreneurship. Burt contends that ‘networks rich in the entrepreneurial opportunities of structural holes, are entrepreneurial networks, and entrepreneurs are people skilled in building the interpersonal bridges that span structural holes’ (Burt 1998: 11). Burt et al. (1998) attempt an investigation of ‘whether personalities differ across the structural hole continuum’ (1998: 65). Here entrepreneurship is related to network constraints but obviously hierarchy matters as structural holes affect actors with different centrality in a different way. I find this a rather limiting definition of entrepreneurship as should be obvious from the definition I proposed earlier. Entrepreneurs are not just brokers, and political entrepreneurs are not just dealing in information and power flows. Political power does not have to be exercised to be present and the exercise of political power is not the only way actors become aware of it. Furthermore, structural constraints, including political institutions, cannot be mapped with reference to actor relations alone. So, for similar reasons that definitions used by political scientists are found wanting, I find network theory accounts inadequate to provide a comprehensive definition of political entrepreneurship.

Bonacich (1987) has formulated a statistic that relates an actor’s power to the status (centrality) of those to whom they are related. Conceptually and theoretically the statistic has a lot of appeal. However, it depends on a researcher-defined beta coefficient. On the other hand, Knoke et al., in line with standard practice, suggest that ‘describing the network densities, indegrees, and outdegrees among different types of organizations gives an initial overview of . . . power structure dimensions’ (1996: 198). Bonacich centrality is employed here together with closeness centrality as a proxy of actor power. More sophisticated measures to clarify power relations such as blockmodelling, and structural equivalence techniques are deemed superfluous in the context of this study.

A number of interesting attempts have been made to model the relationship between power and political action. The work by Stokman and Zeggelink (1996) attempts a test of a number of different models examining policy versus power as a driving force of political actors. Their findings suggest that ‘policy driven models do better than power driven models in predicting the outcome of decision’. Bonacich (1998) has also formulated a ‘behavioural foundation for a structural theory of power’ by attempting to bridge the micro–macro divide while incorporating an exchange network typology. A number of inevitable assumptions limit the applicability of such a framework to entrepreneurial political action however. Central actors cannot be unaware of the power structure within the network they dominate.

Networks around a policy domain are typically assumed to be homogeneous. Actors central to the domain are assumed to be instrumental in keeping network coherency. Knoke et al. (1996: 23) claim that a:

policy domain’s social space is divided into relatively homogeneous sectors occupied by actors who are likely to share common values, attitudes, and
interests. Located at a network’s center are policy actors who play the key coordinating roles in the domain, whereas the periphery is occupied by actors with less integrative importance.

Relative actor homogeneity and value sharing among actors are tested assumptions on the present research project. Particularly ‘low order’ values that relate to conventions on the ‘rules of the game’ are assumed to be instrumental for the potential for interest intermediation. Higher order values are assumed to be less important for policy entrepreneurship although obviously relevant to actor motivation. It is intuitively obvious that the prevalence of a number of mutually exclusive higher order value systems (ideologies) is likely to produce highly coherent clusters. Actors able to bridge structural ideological gaps can potentially achieve entrepreneurial gain.

Finally, an unavoidable constraint is that of measurement. Actor position can either be inferred by an examination of public records and communications or constructed. In the latter case this could take the form of either reported association or cognitive assessment of relations among actors. Any recollection is obviously subject to actor bias (see Krackhardt 1990). Johnson and Orbach have interestingly found that ‘more central actors display the least bias in centrality’, while downward bias ‘only occurs among the most knowledgeable actors’ and that less knowledgeable actors’ ‘bias is always upwards’ (Johnson and Orbach 2002: 300). This gives us some confidence in treating the cognitive data from elite and informed actors as relatively unbiased.22 This is also one of the reasons why qualitative analysis is given prominence in this investigation. It takes the form of a number of in-depth interviews that attempt to elucidate the contextual background and provide the measurement for two of the variables used. The case study and policy analysis data are a key parameter of this analysis. It is anticipated that these techniques will complement formalized quantitative methods and counterbalance the fundamental weakness of network analysis to integrate a behavioural to a network perspective.

Case study: A policy actor with exceptional behaviour

A complaint was brought against Ryanair by Virgin Atlantic in June 2001 and by Zaventem Airport against the Charleroi public airport in January 2002 (Groteke and Kerber 2004) regarding alleged illegal subsidies Ryanair received to use Charleroi. The claim was that this was against EC rules on competition and state aid. The European Commission (DG Transport) launched an investigation into the Charleroi complaint. The European Commission indicated at the end of January 2004 that it was concluding its investigation in this case and that it was expected to rule against Ryanair and Charleroi.

The Assembly of European Regions (AER) was the first interest group to respond to this press statement from a regional perspective and pointed out the crucial regional dimension of the issue (AER 2004). The AER argued that the development of no-frills airlines has created a new inter-regional
aviation space where regions are being directly linked to each other. This ‘regional dimension of interregional air connectivity’ was claimed to have a number of important benefits including: (1) reviving under-utilized old airports; (2) positively affecting regional development and employment; and (3) enhancing the connectivity of peripheral regions (AER 2004).

It was claimed that these benefits were particularly evident in the case of Charleroi, which was an old mining region with high levels of structural unemployment and a limited development capacity.

The initial press release was drafted by one policy specialist and was sent by 6 p.m. on the day of the Commission announcement (29 January 2004) to all AER press contacts. By 9 p.m. that same evening the AER press release was being carried in major news services and received extensive attention from the policy community.

Approximately a week later (on 3 February) the then European Union (EU) Commissioner, Loyola De Palacio (DG Transport), held a press conference to announce her preliminary decision on this case (European Commission 2004). The Commission decided that part of the subsidy which Ryanair received from Charleroi airport was against current EC competition rules and would have to be paid back, but it also found that most of that subsidy was allowed within present rules. Out of estimated subsidies of 15 million euro, Ryanair was required to reimburse approximately 4 million euro. The press release that accompanied the conference was entitled ‘Commission decision good for no-frills airlines and good for regional development’. In a footnote, which was repeated twice in the press release, the Commission acknowledged that regional development is linked to the operation of regional airports and the activities of no-frill airlines. In the main text the press release focused on a purely economic analysis of the agreement between Charleroi airport and Ryanair and an attempt at a strict application of the EC competition rules.23

Actors 1 and 2 (both AER regional policy specialists) analysed the press release of the Commission and formulated a counter position. This document maintained pressure on the EU Commission by claiming they had failed to consider the beneficial economic repercussions on the regions of inter-regional transport links.

By mid-February 2004 the issue was picked up by the Committee of the Regions (CoR), an official EU body, which designated a rapporteur within its transport committee to analyse the issues raised for the regions by this case. Initial papers from the CoR show substantial similarities to the papers published by the AER on this subject.24

Actors within the AER maintained momentum and held a meeting on 12 February 2004 on the issues raised by the case. They invited regional political representatives and representatives of the airports to attend. A series of meetings succeeded this first initiative, with actors within the AER maintaining a key co-ordinating role. Most significant of these was a conference in Barcelona on 21 April 2004 between EU Commission officials, AER and other organizations, and a meeting at Stanstead airport on 27 May 2004.
This activity was instrumental in heresthetically altering the agenda and forcing the Commission to re-examine its position. This led to a White Paper and a consultation process, concluded on 7 March 2005, which tried to formalize the rules under which regional public airports can deviate from internal market competition regulations (European Commission 2005).

The network analysis of this case of policy intermediation includes the main policy advisers within the AER Secretariat (actors 1–4). Actor 5 is a member of a regional Parliament linked to the AER. Actor 6 is a special adviser to a political actor linked to the AER. Actor 7 is a senior executive of Ryanair and the only actor with a predominately corporate remit. The network also includes a number of senior bureaucrats in EC institutions: actor 8 in DG Transport, actor 10 in DG Competition, actor 9 in the Committee of the Regions. Actors 11 and 12 are senior functionaries of an airports association and an airlines association respectively, while actors 13 and 14 are senior executives of regional airports (Figure 1).

The relationships mapped comprise an account of public records of interaction supplemented with the cognitive network of key informants. A judicious examination of relevant communiqués, public statements and a number of off-the-record interviews provides confidence that the network mapped closely approximated interactions between 29 January and 12 February 2004 among

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Figure 1 Network of actors reacting to the Ryanair/Charleroi decision of the EU Commission in February 2004
Source: Network constructed by data entry into UCINET (Borgatti et al. 2002) and graphed with Netdraw.
this policy community. The time point mapped is at the height of influence and interest intermediation played by actors in the AER. This organization is a comparatively obscure body (overshadowed by the institutionally legitimate CoR) representing the interests of a number of European regional bodies at the EU institutions. The CoR by comparison commands considerable resources, while its inclusion in the EU policy cycle provides it with relative political weight. In this instance by an exceptional assessment of an opportunity for intermediation, the AER functionaries seized the initiative and were effective in forcing the EC Commission to reassess a policy intervention. They were effective in a heresthetic re-formulation of the agenda and in elevating their organization from a marginal position to being a key player in future policy initiatives in the field.28

WHAT TYPE OF ENTREPRENEUR?

For reasons of expediency and in order to simplify the presentation of the analysis I expound here on the role of actors 4,8,9,10 who hold the positions with the highest legitimacy (as well as hierarchical superiority) and relative political weight: actor 1 is the policy instigator; and actors 7, 13 and 14 are those directly affected by the policy. An examination of the qualitative and quantitative network parameters is offered in Table 1.

Hypothesis: Incremental policy actors

Public entrepreneurs attempt to control the policy cycle by incrementally adjusting their policy positions.

‘Rival’ hypothesis: Opportunistic policy actors

Public entrepreneurs attempt to effect policy change by opportunistically intervening in the policy cycle.

A quantitative network analysis of the policy initiative reveals that actors 8 and 1, followed by actor 7, appear more central and therefore proximate to other network members in terms of information flows in the network (Freeman betweenness centrality). The same actors exhibit the highest power (Bonacich power) by connecting to both low- and high-powered others. A number of other actors have above-average network power by connecting to low-powered others the most significant of which is actor 9. Thus the quantitative investigation confirms that DG Transport (actor 8) had the most potential for controlling information flows with the key AER policy entrepreneur (actor 1) and the Ryanair executive (actor 7) closely following. A simple measure of connectivity, measuring ties directed to others (outdegree) elevates actor 4 to prominence. These relationships however are not reciprocated by those whom actor 4 attempts to influence. This may be demonstrated by examining interaction received from others (indegree).
## Table 1: Actor and hypotheses comparison for public policy actors

| Actor network attributes, qualitative and sociometric values | Hypothesis 1: Incremental adaptation | Case study R-t1 | Hypothesis 2: Opportunistic actor |
|-------------------------------------------------------------|--------------------------------------|-----------------|----------------------------------|
| A. Centrality within issue network – perceptions of interaction (qualitative) | 8 | 3 3 5 8 4 7 4 4 5 |
| B. Dominance of issue network – perceptions of relative influence (qualitative) | 9 | 2 2 5 7 3 8 3 3 5 |
| C. Dominance of new policy domain – perceptions of actor control of information (qualitative) | 3 | 8 4 7 4 3 4 2 2 8 |
| D. Size of ego’s network at time of policy initiative (structural holes effective size) Network mean: 3.88 (SD 1.66) | 3 | 8 5 7 9 6 3 4 2 8 |
| | | 6.85 3.00 6.53 7.36 3.75 2.50 2.87 2.40 |
| Actor network attributes, qualitative and sociometric values | Hypothesis 1: Incremental adaptation | Case study R-t1 | Hypothesis 2: Opportunistic actor |
|---------------------------------------------------------------|-------------------------------------|----------------|----------------------------------|
|                                                               | Actor 1 | Actor 4 | Actor 7 | Actor 8 | Actor 9 | Actor 10 | Actor 13 | Actor 14 |
| E. Information control (Freeman betweenness centrality) Network mean: 4.71 (S.D. 5.39) | 8       | 8      | 4      | 7       | 9       | 6       | 5       | 3       | 2       | 7       |
|                                                               | 15.6    | 1.23   | 7.99   | 17.6    | 4.44    | 2.50    | 0.50    | 0.00    |          |
| F. Dominance of policy initiative (Bonacich measure for connecting to weak other actors) Mean: 3.55 (SD 1.46) beta = −0.1295 | 3       | 8      | 5      | 7       | 9       | 6       | 2       | 4       | 3       | 9       |
|                                                               | 6.02    | 3.22   | 5.58   | 6.34    | 3.79    | 1.43    | 2.81    | 1.95    |          |
| Measure Description                                                                 | Values |
|------------------------------------------------------------------------------------|--------|
| G. Dominance of policy initiative (Bonacich measure for connecting to strong other actors) | Absolute mean: 1127 (SD 269) beta = 0.1295 |
|                                                                                     |        |
| H. Interaction directed to others at the time of policy initiative                  | Mean: 40.7 (SD 8.4) |
| (outdegree Freeman normalized centrality)                                           |        |
|                                                                                     |        |
| I. Interaction received from others at the time of policy initiative                | Mean: 40.7 (SD 23.7) |
| (indegree Freeman normalized centrality)                                           |        |

Note: Assigned ranked values for measures A, B and C are based on informant interviews. Values for measures D to I are based on an ordinal ranking of the sociometric network values employing SPSS 12.01. Sociometric values computed with UCINET software (Borgatti et al., 2002), while a comprehensive analysis of the statistics employed may be found in Wasserman and Faust (1994).
Included here is the measure of the size of an actor’s network, a statistic that calculates the connectivity of those to whom they are connected and by implication their relative brokerage advantages (Burt’s structural holes). This may also be seen as a measure of an actor’s information advantage since being a bridge between highly connected others improves an actor’s relative power. Actors 8, 1 and 7 are again shown to be prominent. The potential for coalition building and/or commanding support was highest for the most powerful actors, who in this instance are the ones generating most publicity and actively seeking contacts with others. The senior bureaucrat in DG Transport, the AER policy entrepreneur and the Ryanair executive all seem to play that role. The Committee of the Regions (actor 9) had the potential to be an influential actor but only entered the fray at the last stage of the time frame examined.

It would be meaningless to add up actor values to an actor ‘entrepreneurship score’ without having a reliable theory to weight actor attributes. Two alternative types of entrepreneurial behaviour are modelled here which further make the use of any such index counter-intuitive. It may be hypothesized however that those with an above-average entrepreneurship ratio would be embedded in networks that would allow effective entrepreneurial action, but such a premise would have to be independently tested. Proof of such assumptions is beyond the scope of this discussion. I proceed to examine how well actors ‘fit’ either of the two alternative hypotheses offered by examining how well individual actor attributes associate with the hypothesized ones.

In Table 2 there is evidence of strong positive association for the opportunistic actor hypothesis for actors 1, 4 and 7. The same actors show a strong negative association towards the incremental actor hypothesis. Actor 10 shows a strong positive correlation to the incremental actor hypothesis and negative to the opportunistic actor hypothesis. Qualitative analysis suggests that actors 1 and 7 have demonstrated opportunistic entrepreneurial initiative while, due to his role and hierarchical position, actor 10 has systematically demonstrated incre-
mental behaviour. Actor 4 has oscillated between opportunistic and incremental behaviour; since he has a low relative impact on agenda-setting it is fair to assume that he has a similarly low impact on the policy community. Actor 8 (DG Transport) who has high resource and decision-making authority cannot be associated with either hypothesis in the particular time frame. It should also be obvious that covert behaviour cannot be captured by this model. Actor 9 (CoR), central to the issue network, only took incremental entrepreneurial action at the latter stages of the present time frame. The nature of the available data limits the likelihood of capturing all relevant parameters of interaction between these actors. Moreover, current measures can only provide a broad indication of fit and at best infer an inductive interpretation on how closely these actors approximate hypothesized ‘ideal states’.

To further explore proximity of these actors to the hypotheses, I average all the sociometric ranks (measures D to I) as a ‘composite of their relative centrality’ and compare it in a scatterplot with the qualitative assessment among informants of actors’ dominance of the new policy domain of ‘inter-regional air connectivity’. This provides a crude measure of overall centrality (Figure 2). The two hypotheses are plotted as opportunistic for opportunistic actor and incremental for incremental actor. Actor 10 is situated in proximity to the incremental hypothesized location, while actors 1 and 7 are clustered in proximity to the opportunistic hypothesis location. Although of limited explanatory power Figure 2 allows some insights not directly obvious from the network analysis.

Figure 2 Scatterplot of sociometric and qualitative measures
Significantly for the model, it indicates the position of actors 8 and 4 to be against their hypothesized proximities. Actor 8 appears close to the location of the opportunistic hypothesis, while actor 4 is closer to the position of the incremental hypothesis. These actors’ ‘network ambiguity’ is congruent with how informants assessed their role and point to the importance of examining entrepreneurial behaviour within its temporal context. It also serves as a reminder that theorized ideal states of human behaviour have to be seen as approximations of human interaction. Potentially a combination of psychometric tests (to provide an insight into an actor’s behavioural profile) with network analysis (exploring actor relational advantages and constraints) can enhance our understanding of whether an actor’s network position and interaction is likely to produce entrepreneurial behaviour. The current analysis has indicated the existence of a relationship between an actor’s positional authority, relative status and political capital with their propensity for entrepreneurial behaviour. Confidence in such a relationship would have to be verified by a more in-depth study.

CONCLUSION: AUTHORITY, POLITICAL CAPITAL AND POLICY ENTREPRENEURSHIP

In this study, actor 1 is identified to have: (1) successfully disseminated a number of press releases, (2) written a key briefing paper, (3) generated new network ties within the policy community, and (4) effectively co-ordinated the policy initiative. The actor, without necessarily demonstrating any exceptional foresight, an interest in political contestation or any strong ideological motivation, has however been successful in promoting an item on a multinational and inter-organizational agenda. The other significant political entrepreneur (actor 7) should have expected his firm to be sanctioned or fined for violating EU competition rules. Instead his company was allowed to retain two-thirds of the subsidies received and may well benefit from an impending clarification in competition rules. Actor 1, with no significant prior presence in the relevant issue network, has – for a brief period of time – dominated a policy initiative and ended up being the most central actor while a new policy was re-formulated. On the basis of the available data I consider actor 1 (interest intermediation actor) to closely fit the network parameters assumed on the hypothesis of an opportunistic public entrepreneur. Actor 7 (corporate interest) has reaffirmed their central position within the issue network and attained a tactical victory towards regulation authorities. He has demonstrated predominantly opportunistic behaviour which fits well within the assumptions of that hypothesis.

The assumptions associated with both hypotheses and their exploration limit the potential for wider generalizations. Evidence presented here indicates dominance of opportunistic entrepreneurial behaviour among political actors with low levels of political capital. It follows from this analysis that political entrepreneurship is contingent upon actor status and authority. The amount of political capital actors are willing to employ is determined not only by how much capital
they initially possess but what are the potential returns. It seems a legitimate assumption that actors with low political capital can only hope to attain prominence by engaging in high-risk opportunistic actions; while actors with high political capital can be more circumspect and invest their more extensive resources in low-risk incremental ventures.\footnote{32}

I have argued here that political actors can be only \textit{relatively entrepreneurial}. The implication therefore is that, to research the effect of political actors on the policy process, it is adequate to distinguish the most exceptional among them and to determine the degree to which their behaviour is entrepreneurial. An actor’s network provides a framework within which the actor can project power, control information flows and attempt to influence political outcomes or other actors. A network approach, therefore, integrates structure within an agent’s actions by making the one contingent on the other. I anticipate these conclusions to acquire resonance when multiple network time points and policy entrepreneurs have been examined.

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\textbf{NOTES}

1 The foundations of the contemporary analysis of entrepreneurship may be traced to Schumpeter (1939, 1961) and the Austrian schools’ revival of the same principles by Kirzner (1973, 1985). An interesting analysis based on the role of institutions in containing negative entrepreneurship may be found in Baumol (1990).

2 Outside the remit of this exposition is the related issue of the paradox of collective action. Of relevance to public entrepreneurship is work by Olson (1965), Frohlich \textit{et al.} (1971) and Ostrom (1998).

3 Indeed, it may be argued that the perennial structure and agency debate can be transcended since network relations in themselves entail both actor and structure attributes. An interesting perspective to this debate is provided in Knoke (1990).

4 For an alternative definition see Boyett (1997). Ostrom (1965) and Wagner (1965) have been influential in defining the role of public entrepreneurs.

5 See Christopoulos (2001).
I employ policy communities as a descriptive term (see Richardson and Jordan 1979). As Jordan has recently clarified, ‘to suggest there is a community tells us in preliminary fashion of a structure and a policy making orientation’ (2005: 321). Jordan also points out that ‘the community is a particular type of network’ (2005: 317).

Many motivations are hypothesized for political entrepreneurs. Their motives are assumed to be linked to guilt and self-satisfaction (Boyett 1997: 90); altruism (Arce 2001: 114–15); the promotion of personal interest and values; the joy of power (Kingdon 1995: 123); and proof of superiority to others and the joy of creating (Kuhntert 2001: 23).

See Knoke et al. (1996: 9-11) for the background conditions that lead to the creation of new policy domains.

Baumgartner and Jones suggest that policy entrepreneurs attempt to establish monopolies ‘on political understandings … and an institutional arrangement that reinforces that understanding’ (1993: 14). Their view implies that political actors attempt to determine the acceptable policy options and institutional arrangements in a policy domain.

See also Mintrom and Vergari (1996); Mintrom (2000); Schneider et al. (1995).

Marsh and Smith (2000, 2001) contend that they follow a ‘realist’ epistemological perspective, as opposed to a strictly empiricist account. I have taken the liberty of grouping authors with a similar perspective under their banner. I have summarized a critique of ‘realist’ policy networks in Christopoulos (2004).

Of direct relevance is the attempt by Hay and Wincott (1998) among others to develop historical institutionalism as the theoretical background to this debate (see also Hall and Taylor 1998).

An extended version of this section is presented in Christopoulos (2004).

For a literature review see Borgatti and Foster (2003).

Burt further suggests that it is the different flows of information that create opportunities for brokerage – ‘A structural hole indicates that the people on either side of the hole circulate in different flows of information’ (Burt 1998: 9) – while ‘Networks rich in structural holes present opportunities for entrepreneurial behaviour’ (Burt 1998: 10–11). Burt even sees social capital as ‘a matter of access to the information and control benefits of structural holes’ (Burt 1998: 33).

A very interesting comparison of different theories for organizational change by McGrath and Krackhardt (2003) suggests that focus on structural holes may be unproductive.

Burt (1998) focuses on managerial networks and proposes (1) flat structures that might be entrepreneurial or clique and (2) hierarchical structures that could have the boss as a central or non-central contact.

Knoke and Kuklinski suggest that ‘The structure of relations among actors and the location of individual actors in the network have important behavioral, perceptual, and attitudinal consequences both for the individual units and for the system as a whole’ (1982: 13).

This coefficient is defined by the maximum eigenvalue of a matrix (Bonacich 1987). When positive values are employed, this implies that relating to high-powered others increases an actor’s status, while when negative values are employed it implies that connection to low-powered others increases an actor’s status. Borgatti et al. (2002) provide a definition in the help menu.

Knoke et al. give a good non-technical definition: ‘Blockmodel analysis is a quantitative method for reducing the complexity of relations and perceptions in multiple networks of actors. . . . In very general terms, starting with multiple actor-by-actor binary networks, a blockmodel analysis either clusters actors into positions or clusters their relations into roles’ (1996: 2001).
21 The difficulty with modelling has led to some unrealistic assumptions on voting patterns and the absence of political capital, and while no assumptions are made about the history of the relationships between actors, the methodology is nevertheless very promising.

22 A caveat reported by Johnson and Orbach (2002: 308-9) is that political actors may have an incentive to consciously exaggerate their relative network position in order to build reputational social/political capital.

23 See European Commission (2004).

24 The European Commission is attempting to formulate guidelines in this area, a task that many consider near impossible. An informant has suggested that the Competition Commission (actor 10) had warned the Transport Commission (actor 8) against opting for guidelines in this area, considering this to be an area of extreme complexity with a large number of conflicting interests to be considered.

25 Marsden (2005) analyses the methodological options available for determining boundaries in social network analysis. The current exposition employs an event-based approach.

26 Not all actors have agreed for their affiliation data to be fully released. Reported evaluations of network relations at further time points will comprise an evolutionary perspective to this case study.

27 For the uninitiated a good reference to the often chaotic system of EU governance is provided by Richardson who suggests that the system of EU governance is perhaps best described as uncertain agendas, shifting networks and complex coalitions' (2000: 1021).

28 Heresthetics is the ability of certain actors to change an agenda by altering the frame of reference of the debate (Riker 1986).

29 Other actors are only excluded for reasons of expediency. They hold low centrality, while the qualitative analysis implies that they are marginal to the policy process. Actor 2 has been excluded from the analysis although they have above-average in- and outdegree centrality as they have not taken any initiative in this instance and work under the supervision and direct control of actor 1.

30 Furthermore, as I have assumed here, high authority does not necessarily imply high reserves of political capital, a presumed condition for incremental entrepreneurial behaviour.

31 Actor 4 (a low-status actor) in informant accounts is perceived as being a bureaucratic incrementalist, while actor 8 (a high-status actor) is perceived to oscillate in behavioural patterns.

32 This obviously mirrors the behaviour of economic agents.

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