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|  | **Questions** | **Answer** | **Status** |
| 1 | **Clarification of CFN & CFN-dyncast** | CFN: Compute first networking. It is used to refer a general trend for "compute-network integration”  CFN-dyncast: dynamic anycast in CFN; Dyncast focuses on the anycast and compute first networking nodes based routing architecture and optimizations considering the dynamic status of computation and network path characteristics when making routing decisions;  Question gone. For how it relates to the research work in COINRG, please check question 2. | Closed. |
| 2 | **Relation to IRTF RGs: COINRG and ICN based solution, service routing** | Dyncast targets an anycast based routing related engineering solution (through proposed standard specification work) for the problem of optimally choosing and forwarding the packet to the best edge for a service handling by considering the dynamic status of computation and network path characteristics, while work in the IRTF, e.g., ICN RG and COIN RG, is longer-term in alignment with the IRTF objectives; | Closed. |
| 3 | **Service instance & service, how the terms differ from SFC’s** | One Service can have several instances running on different nodes;  Service instance is a running environment (e.g., a node) that makes the functionality of a service available;  All service instances running the same service are identified by the same Service Identifier (D-SID);  A service equals a ‘service function’ in SFC but we do not consider the chaining of services. | Closed. Clarified in  draft-liu-dyncast-ps-usecases |
| 4 | **How to map a Service-ID to a service?** | A "Service ID" (D-SID) is used to uniquely identify a service, at the same time identifying the whole set of service instances that each represent the same service behaviour, no matter where those service instances are running. D-SID can be represented, for example, by a special range or coding of anycast IP address. Each service instance is associated to a "Binding ID" (D-BID), i.e., a unicast address, indicating where the service instance is running. Hence, there is a dynamic binding between an D-SID (the service) and a set of D-BIDs (the instances of the service); | Closed. Clarified in definitions and other text in draft-li-dyncast-architecture |
| 5 | **What is the difference between a CFN-dyncast node and a normal router?** | CFN-dyncast node is a router with additional features to support compute first networking;  D-Router and D-MA are defined as two functional entity types in dyncast with an optional D-Forwarder as well.  D-Router and D-MA can be realized as a normal router + additional function defined in draft-li-dyncast-architecture, while the D-MA may also be directly realized at the service side. | Closed. Clarified in draft-li-dyncast-architecture |
| 6 | **Why realizing dyncast at network level?** | Please refer the deficiency in existing solutions in terms of dynamicity of relations, efficiency, complexity, metrics exposure and use, security and changes to infrastructure. Some of the issues can be dealt with when realizing dyncast at the network level. | Closed. Clarified in  draft-liu-dyncast-ps-usecases |
| 7 | How policy to be defined if it is not centralized? | When the policy refers to the rule to determine the best instance, there are multiple ways, from default rule to locally provisioning to dynamic provisioning. Section 3.5 of draft-liu-dyncast-reqs clarifies it. | Closed. draft-liu-dyncast-reqs. |
| 8 | **Relation with Alto WG** | ALTO is application layer protocol and Dyncast is targeting an anycast based routing methodology, which uses network ingress node steering approach without application awareness. The deficiencies in solutions such as those developed in Alto in terms of dynamicity of relations, efficiency, complexity, metrics exposure and use, security and changes to infrastructure are discussed in the use case draft. | Closed. Clarified in  draft-liu-dyncast-ps-usecases |
| 9 | **Relation to DMM WG: Mobile movement** | The proposed approach for instance affinity support is to initially use the DMM work; If extensions to DMM solutions are needed for the support of Dyncast instance affinity, then requirements will be provided to DMM WG; | Closed. |
|  |  | **Questions below are more for attention for IETF110** |  |
| 10 | **Focus of work: What IETF protocol specification work needs to be done for dyncast?** | Dyncast could focus on:   1. Specification of dyncast framework and functional components 2. Reuse existing IETF protocols when possible. Define protocol extensions when needed or introduce a new protocol when necessary including features like:    * Represent service specific metrics like computing metrics in defined service/service instance context    * Distribute the metrics using routing protocol, potential impact to the protocol like when metrics updates should be sent    * Use metrics in route determination    * Definition of requirements for any new data plane extensions and procedures to ensure the instance affinity; | Open, need more discussions (to be addressed in last agenda item of side meeting) |
| 11 | Is (D-)SID a segment routing ID? Terms are confusing | No. SID is not a segment routing ID as in spring WG. Updated to D-SID, stands for Dyncast Service ID. | Open, updated to D-SID in draft-li-dyncast-architecture but still open to better names. |
| 12 | How to tie the application and routing & computing solution, e.g. how service providers can interact with the system that will support dyncast, how the routing system get information about the service status? | Dyncast proposes to study the interface between network and service provider to encode and inject suitable metrics into the routing system, while also obtaining suitable network information for determining the service-specific metric | Open (to be addressed in agenda item 5 of side meeting). |
| 13 | What types of services to use dyncast. They go on for a week (long live) or are just question/reply (short live)? | There is no limitation on the ‘length of the service’. Dyncast does consider the problem of ‘instance affinity’ where relations between a client and a specific service instance must be prevailed for reasons of, e.g., application state that is being created and held at that service instance. Instance affinity may last only for a single request/reply (e.g., for retrieving a chunk of a video from a storage) or longer. The service specific metrics may incorporate this notion of affinity or it may be handled explicitly. | Open (to be addressed in agenda item 5 of side meeting). |
| 14 | specific proposal would be good to compare to other approaches to better understand what are the differences. | Our current discussions focus on the question on whether a routing-level proposal would yield advantages over existing approaches, as discussed in our use case draft. A more thorough proposal-level comparison will follow once agreement on routing level work has been achieved. | Open. Clarified in  draft-liu-dyncast-ps-usecases |
| 15 | bring this work to COINRG and ICNRG to make sure they are aware that dyncast is engineering focus work of possible relevance to this community | Will send the message to both lists. | Open |
| 16 | The architecture is independent from the underlay network. It is service overlay. | Dyncast proposes an ingress architecture at the routing level. Its mapping could indeed support different ingress-to-service network architectures. An tunnel like overlay data plane can certainly be used, but it is not a must. | Closed. |
| 17 | **What is the relationship between Dyncast and APN?** | They are independent work. Dyncast is an ingress-based anycast architecture aiming at delivering clients’ service demands to the “most suitable” service instance. It involves control plane metrics exchange. APN aims at make packets carrying an application identifier at the data plane for applying policy. It does not relate to anycast. It does not strictly relate to services and service instances (even if a service can be seen as an application). The architecture is more an hop-by-hop oriented since packets may have special service level requirements at that granularity. | Closed. |
| 18 | **Mix use of service specific metrics and computing metrics** | A service-specific metric is a combination of one or more metrics that are inputs to the routing decision on which service instance to choose for a given D-SID; those metrics may include aspects of network and computing infrastructure as well as service-specific aspects such as capabilities of SW/HW constituents. | Open, will revise in next version. |
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