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Rigid motion applied to a Family for a set of Zones

The proposal is a modification of the *Family_t* node. The modification re-use existing CGNS structures, but it implies some constraints to *Zone_t* node and sub-nodes. For time dependent data, this extension is also related with extension '**Modification of BaseIterativeData and ZoneIterativeData for reference frame and family motion**'.

First, we propose to allow the *RigidGridMotion_t* node under the *Family_t* node. The application of the motion is distributed on each zone having a *FamilyName_t* FamilyName value corresponding to the *Family_t* node name.

```
Family_t :=
   {
   List( Descriptor_t Descriptor1 ... DescriptorN ) ;                (o)
   FamilyBC_t FamilyBC ;                                             (o)
   List( GeometryReference_t
         GeometryReference1 ... GeometryReferenceN ) ;               (o)
   RotatingCoordinates_t RotatingCoordinates ;                       (o)

   List( RigidGridMotion_t RigidGridMotion1 ... RigidGridMotionN ) ; (o)

   List( UserDefinedData_t UserDefinedData1 ... UserDefinedDataN ) ; (o)
   int Ordinal ;                                                     (o)
   } ;
```

Side-effect:

The use of a set-of-zones structure usually located in the `Zone_t` node raises the issue of Family related data. As a matter of fact, there is no way to indicate in the `Zone_t` time-dependant rigid motion in the case of a Family rigid motion. As the purpose of the Family based rigid motion is to factorize information from a set of Zones, it is not fair to ask the user to indicate the time-dependant motion for each zone.

Remarks:

1- It is the responsibility of the user application to find if the Zone has a Family with time iterative data or not. In the case of a time-dependant rigid motion declared at the `Family_t` level, no *RigidGridMotionPointers* would be found at the `Zone_t` level.

2- The use of a Family rigid motion in at least one Family of a `CGNSBase_t` implies no Motion node in all `Zone_t` of this `CGNSBase_t` (i.e. no rigid or arbitrary motion).