**I. Functional Interlocking Phenomenon**

**Case 1: 2021-03-23-Q10 (Hua Chunying)**

**(Clear demonstration of interlocking between bridging and engagement functions)**

* **Bridging function manifestation**: "On the basis of fully accommodating each other's concerns and friendly consultation" — connecting different epidemic prevention policy positions between China and foreign countries
* **Engagement function manifestation**: "willing to", "explore establishing flexible and diverse reciprocal mechanisms", "maintain an open and positive attitude" — active invitation for cooperation
* **Interlocking effect**: Promoting joint exploration (engagement) through acknowledging differences (bridging), with the two functions mutually reinforcing each other

**Case 2: 2023-01-04-Q05 (Mao Ning)**

**(Functional synergy in strategic partnership)**

* **Bridging function manifestation**: "All-weather strategic digital mutually beneficial cooperation partner" — connecting the traditional concept of "all-weather" with the new element of "digitalization"
* **Engagement function manifestation**: "China is willing to work together with Pakistan", "steadily advance", "committed to building" — emphasizing joint action
* **Interlocking effect**: Innovative conceptual bridging strengthens the willingness of both parties to participate in cooperation

**Case 3: 2025-01-06-Q03 (Guo Jiakun)**

**(Integration of cognition and engagement in complex issues)**

* **Bridging function manifestation**: "This not only involves bilateral friendly win-win cooperation relations, but also relates to regional stability and global governance" — elevating bilateral issues to a multilateral framework
* **Engagement function manifestation**: "Rather, it is beneficial to downstream disaster prevention and mitigation to a certain extent" — transforming concerns into common interests
* **Interlocking effect**: Promoting community of interests awareness through expanding cognitive frameworks

**II. Cognitive Emergence Effect Cases**

**Case 1: 2022-01-04-Q07 (Wang Wenbin)**

**(Multiple cultural resources creating holistic meaning)**

* **Cultural schema combination**:
  + MTE: "good start" (modernization of traditional auspicious phrases)
  + CFP: "One China principle" (policy discourse)
  + DED: "through network platforms" (digital era expression)
* **Emergence effect**: The combination of traditional cultural symbols + political principles + digital media creates the holistic image of "rapidly developing new diplomatic relations"

**Case 2: 2023-01-03-Q03 (Mao Ning)**

**(Multi-level framework integration producing three-dimensional cognition)**

* **Cognitive resource integration**:
  + "The complexity and volatility of the international situation" (macro background)
  + "The diversity of all parties' concerns" (multiple perspectives)
  + "Bilateral relations" + "regional stability" + "global governance" (three-level framework)
* **Emergence effect**: Constructing a three-dimensional cognitive framework from bilateral to regional to global levels, transcending single-level understanding

**Case 3: 2025-01-02-Q02 (Mao Ning)**

**(Fusion of action narrative and emotional expression)**

* **Multi-dimensional integration**:
  + Specific data: "35 tons, 235 cubic meters" (rational dimension)
  + Supply list: "tents, folding beds, water purification equipment" (practical dimension)
  + Emotional expression: "good friends, good partners, good brothers" (emotional dimension)
  + DED: "based on online systems" (technological dimension)
* **Emergence effect**: The combination of data precision + practical specificity + emotional sincerity + technological modernity creates the overall effect of a "responsible major country image"

**Case 4: 2024-01-03-Q02 (Wang Wenbin)**

**(Multiple meaning construction in concise response)**

* **Resource combination**:
  + CFP: Standardized expression of diplomatic condolences
  + DED: "utilizing digital technology"
  + Action commitment: "willing to provide necessary assistance for Japan's earthquake relief"
* **Emergence effect**: In the context of natural disasters, the combination of traditional diplomatic etiquette + modern technological means + humanitarian spirit transcends simple condolences, constructing the practical meaning of a "community with a shared future"

**Summary**

The functional interlocking phenomenon primarily appears in contexts requiring balance between different positions and promotion of cooperation, manifested as mutual reinforcement between cognitive bridging and engagement invitation. The cognitive emergence effect is commonly seen in complex expressions that comprehensively utilize various cultural and cognitive resources, creating holistic meanings that exceed the sum of their parts through resource integration. These two phenomena jointly support the theoretical proposition that digital semiotic resources serve as constitutive components of cognitive systems.