

The background features a light blue gradient that transitions from a pale blue at the top to a deeper blue at the bottom. Scattered across this gradient are numerous water droplets of various sizes, some appearing as simple circles and others as more complex, rounded shapes with highlights and shadows, giving them a three-dimensional appearance.

DNA EXTRACTION

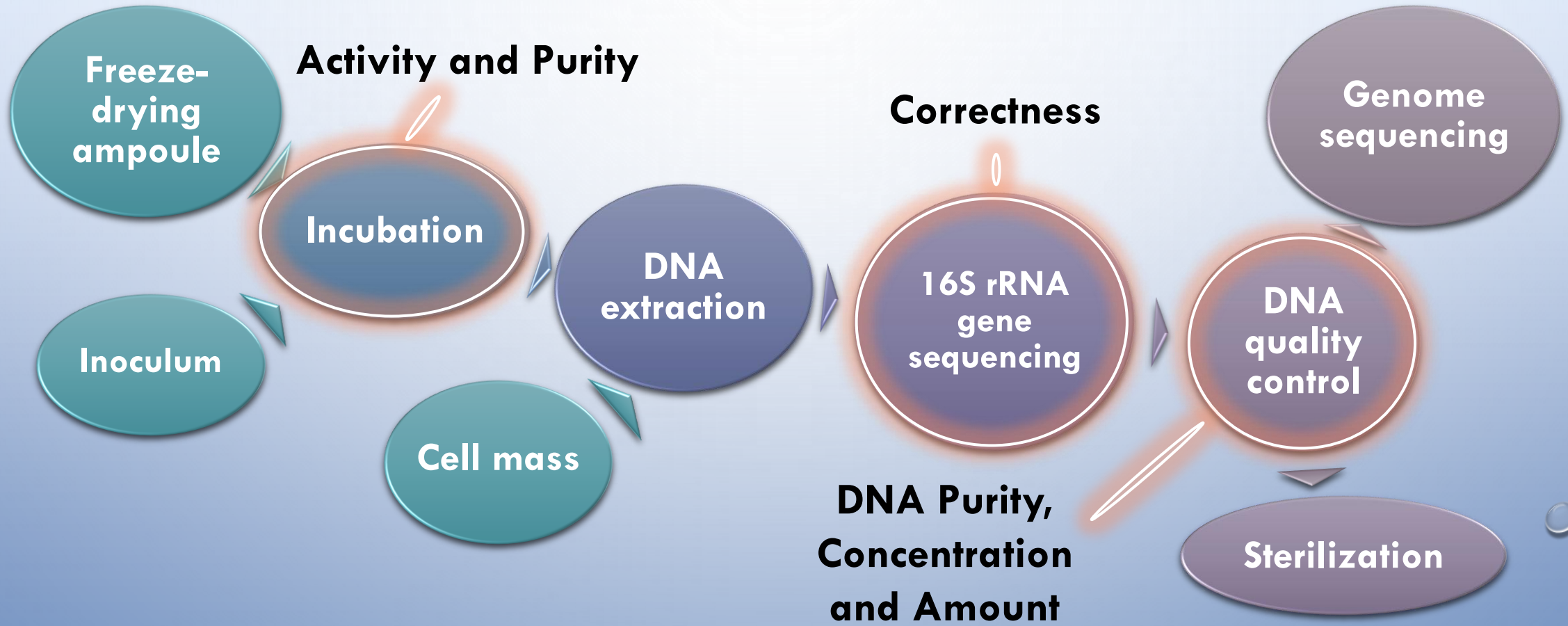
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WORKFLOW



QUALITY CONTROL

- **Incubation**

For Freeze-drying and inoculum samples

Incubate the sample on its own medium.

Answer:

Is it alive cell?

If dead, repeat test.

Is it axenic strain?

If not, select and purify.

QUALITY CONTROL

- **16S rRNA gene sequencing**

For cell mass samples and strain-pure culture

Extract DNA and align two 16S rRNA gene sequences.

Answer:

Is it correct strain? If not, repeat test.

Pairwise difference < 5 bp.

QUALITY CONTROL

- **DNA quality control:**

For correct strain

Check DNA quality:

Purity $1.6 < A_{260}/A_{280} < 2.0$

Concentration $>20 \text{ ng}/\mu\text{L}$

Amount $>1 \mu\text{g}$

Total cost of each strain: 100 USD.


CURRENT STATUS

	Total	Correct	Incorrect	In-cultivable	Others	Enter test
Freeze-drying and inoculum	126	57	10	6	-	53
Cell mass	66	55	9	-	2	-

**Strain-correctness of culture collections:
83⁰% and 68⁰%.**

SUGGESTION

**Please send new tested 16S rRNA gene
sequence of each bacterial type strain together
with sample to us.**

The background is a light blue gradient. There are several realistic water droplets of various sizes in the corners: top-left, top-right, and bottom-right. The text is centered in the middle of the page.

THANKS FOR YOUR ATTENTION!