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Functional Digital Skills

UNIT 1: NUMERACY

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2.LEARNING GOALS

Learning Goals

After Unit 1 the trainees will be able to

- ❖ Build confidence in interpreting numbers, prices, and statistics in digital environments.
- ❖ Navigate online financial interfaces (e.g., e-banking, payment platforms) with accuracy and security.
- ❖ Recognize and avoid unsafe online transactions, especially in e-commerce.
- ❖ Compare product prices and payment terms critically, identifying misleading or “hidden” costs.
- ❖ Understand how algorithms and personalization affect what financial offers, news, or ads appear online.
- ❖ Develop safe habits for entering and managing personal and financial data online.
- ❖ Use digital tools (budgeting apps, calculators, currency converters) effectively for everyday financial decisions..



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3. LEARNING OUTCOMES

Learning Outcome 1 - Applying Functional Digital Numeracy in Everyday Life

*(Skills for understanding and using
numerical and financial information in
digital contexts)*

**Explain what functional digital numeracy
is and why it is essential in online
environments.**

**Interpret and compare prices, interest
rates, and payment options on e-
commerce and banking platforms.**

**Identify at least 3 signs of a secure and
trustworthy online financial interface.**

**Recognize misleading numerical claims
(e.g., “up to 70% off”) and hidden
charges.**

**Spot common patterns of online financial
fraud and scams.**



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2.LEARNING OUTCOMES

Learning Outcome 2 – Practicing Safe and Informed Digital Financial Behavior

(Practical digital actions and safe habits for financial security)

Use budgeting tools, online calculators, and currency converters to support financial decision-making.

Adjust security settings in e-banking and payment apps to protect against unauthorized access.

Demonstrate safe online shopping habits, including verifying sellers and payment gateways.

Identify when algorithms may be influencing purchasing options or financial news feeds.

Apply critical thinking to both numerical and textual financial information before making decisions.



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A. Functional Digital Numeracy and Financial Interface Skills





Why Functional Digital Numeracy Matters

Functional digital **numeracy** means more than knowing how to add and subtract — it's about confidently using numbers, data, and financial tools in real-world digital situations. This skill is essential because:

- Most financial transactions today happen online (banking, payments, e-commerce).
- Numbers can be presented in misleading ways to influence consumer choices.
- Digital interfaces may be complex, hiding important information behind menus or small print.

Real-world example: An online store shows a “50% discount” — but the price is higher than last month's regular price. Without checking historical prices or calculating the real savings, you could end up overpaying.

Digital Tip: Always read numbers in context — percentages, interest rates, and totals can be deceptive if key information is missing.

Recognizing Reliable Online Financial Interfaces

How to recognize reliable sources

Secure and trustworthy online financial environments often have:

- HTTPS and a padlock symbol in the browser bar.
- Clear company identity, contact details, and customer support options.
- Transparent pricing, with taxes, fees, and currency conversions visible before payment.

Numeracy + Digital Skills = Financial Confidence

- Compare loan or credit card interest rates accurately.
- Calculate true costs after adding fees and shipping.
- Read and interpret digital charts showing expenses or account activity.
- Recognize when statistics or graphs are misleading (e.g., using a skewed scale).

Warning signs of unreliable sources

- Vague or missing company information.
- Prices that seem “too good to be true.”
- Requests for unusual payment methods (gift cards, cryptocurrency).
- Poor language or spelling on payment pages.

Develop healthy habits online

- Double-check payment amounts and details before confirming transactions.
- Keep records of online purchases and bank statements.
- Use two-factor authentication for banking and payment apps.
- Avoid financial decisions based only on “urgent” offers or pop-ups.

B. Digital Financial Literacy and Safe Online Shopping





What Is Digital Financial Literacy?

Digital **financial literacy** is the ability to understand, evaluate, and manage financial activities using digital tools and platforms. It includes:

Navigating online banking and payment gateways.

Understanding fees, taxes, and exchange rates in online transactions.

Recognizing secure vs. insecure payment environments.

Making informed choices when shopping online.

Safe Online Shopping means applying these skills to protect personal data, avoid fraud, and get the best value for money.

Signs of a safe e-commerce site:

Signs of a safe e-commerce site:

HTTPS and padlock icon in the address bar.
Clear company information and return/refund policies.
Recognizable payment processors (PayPal, Visa, Mastercard).
No excessive or irrelevant personal data requested.

Warning signs:

Requests for direct bank transfers without buyer protection.
Unrealistic prices or “too good to be true” deals.
Websites with unprofessional design or broken links.
Sellers who refuse to provide contact information.

How to Protect Your Money Online

Use strong, unique passwords for shopping and banking accounts.
Turn on two-factor authentication.
Shop only on trusted platforms or official brand websites.
Avoid public Wi-Fi when entering payment information.
Always log out from financial accounts after use.

**EVERY SAFE PURCHASE
STARTS WITH A SECURE
PLATFORM**

Smart Consumer Habits

Compare prices across different platforms before buying.
Read product reviews from multiple sources.
Calculate the total cost including shipping, customs, and possible currency fees.
Be cautious with “limited time” offers designed to create urgency.

Quote: *"An informed consumer is the best defense against online fraud."* — OECD, 2021

Digital Tools for Safer Shopping

Price comparison tools: Google Shopping, PriceRunner.
Payment protection services: PayPal Buyer Protection.
Currency converters: XE.com, OANDA.
Browser security plugins: HTTPS Everywhere, Privacy Badger.



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“Adults learn best when they are involved in the planning and evaluation of their instruction; when learning is experiential, problem-centered rather than content-oriented; and when the subject is of immediate value.”

— *Malcolm S. Knowles, from The Adult Learner: A Neglected Species (1973)*

Quote



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C. Algorithm Awareness and Echo Chamber Exploration





Why Algorithm Awareness Matters

Algorithms decide what we see online — from product recommendations to financial news and investment tips. While they can make browsing more convenient, they can also:

- Limit exposure to diverse offers and information.
- Push targeted ads or products based on your past clicks, not your real needs.

- Create “echo chambers” where you see only content that confirms your existing habits or beliefs.

Real-world example: After searching for a credit card, you start seeing ads only for high-interest cards from certain banks — never seeing better deals from competitors.

What Is an Echo Chamber?

An echo chamber occurs when online content is filtered to match your preferences, reducing exposure to alternative viewpoints or offers. In financial contexts, this can mean:

- Seeing only certain brands or stores.
- Getting one-sided financial advice.
- Missing better deals or safer options.

Warning signs:

- You always see the same sellers or platforms.
- Recommendations seem repetitive and unrelated to your actual needs.
- You rarely encounter new or unfamiliar options online.

Recognizing Manipulation Through Data

Ads may highlight “only 2 items left” or “sale ends in 1 hour” — this is often algorithm-driven urgency, not reality.

Price changes may be dynamic, based on your browsing history or device type.

Be aware that even financial “news” articles can be sponsored content.

Quote: “When information is filtered, choice becomes an illusion.” — Pariser, 2011

Breaking Out of the Algorithm Loop

Search in “private” or “incognito” mode to avoid personalized results.

Clear cookies and browsing history before researching important purchases.

Use comparison sites instead of clicking only on ads.

Follow independent review channels and consumer forums.

Digital Tip for Everyday Use

Once a month, actively search for products, services, or information outside your usual platforms.

This helps expand your awareness and prevents algorithmic narrowing.

LEARN TO DECODE HEADLINES



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Quote



"Financial literacy is not an end in itself, but a means to greater participation, confidence, and resilience in an increasingly digital world." — Adapted from OECD, 2021

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THANK YOU

Does anyone have any questions?
Follow the project updates

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