

INDEX

A

accessibility 156
 action recorder software 41
 ADDIE 118, 140
 ADDIE Model 89
 advantages and disadvantages of the
 DL technologie 36
 affective 15
 affective domain 18
 analog voice signals 146
 analysis 16
 analyzing and tracking 151
 animation 131, 146
 application 16
 aspirations 18
 Asymmetrix 162
 asynchronous 8
 asynchronous communication tools
 149
 asynchronous correspondence 51
 asynchronous learning networks 8
 audio and video limitations 76
 audio conferencing 71
 audio file formats 132
 audio-conferencing 51
 audiographic telecourses 87
 authentication 69
 authoring/programming 147
 authorization Tools 153
 autoCAD 131

B

bandwidth requirements 76, 82
 behavior transfer 191
 Bloom's taxonomy 18
 branching operations 26
 budgeting for the DL 173
 building knowledge 152
 building motivation 152
 bulletin boards 51, 59

C

categories of learning objectives in the
 cognitive 16
 CBT 27
 CBT, CAI or WBT, with some telecon-
 ferencing support 102
 CBT, WBT, videotapes, VTT, and
 teleconferencing 103
 centralized result tracking 64
 certification assessment 108
 change management 174
 characterization by a value 20
 chat communication packages 59
 chat rooms 49
 client workstations 60
 CMI 180
 CODEC 83
 cognitive 15, 29
 collaboration software 51
 collaborative environment 184
 combined delivery 3, 101
 Commercial Off The Shelf (COTS)
 software tools 131
 common and consistent interface 39
 communication feedback 22
 communication process 174
 communication theory 21
 comprehension 16
 compression algorithms 130
 compression factor 117
 compression rate 118, 181
 compute-aided instruction 44
 computer access 42,65
 computer assisted instruction 8
 computer conferencing 58
 computer learning center 185
 computer mediated education 8
 computer mediated training 8
 computer-aided instruction 44, 109

computer-aided learning 44
 computer-aided teaching 44
 computer-based instruction 25
 computer-based learning 44
 computer-based teaching 44
 computer-based training 109
 computer-controlled robotics 105
 computer-mediated communication 26
 conferencing systems 58
 constructivism 29
 continual learning 172
 continuous assessment 107
 Contractor Conversion Support 121
 control of learning environment 42
 conversion 55
 copyright issues 68
 CorelDraw 131
 correspondence education 6
 cost 42
 cost effectiveness 156
 costs of developing and implementing WBT courses 61
 course characteristics 109, 188
 course complexity 115
 course developer 68
 course managed Instruction 113
 course managed instruction (CMI) systems 52
 Course Management Systems (CMS) 113, 156
 course managing 151
 course map 54
 course monitoring 151
 course planning 151
 course standardization 47
 CourseInfo 164
 crash recovery tools 153
 creation 56
 critical success factor 171

D

data conferencing 71
 decision trees 26
 definitions 6, 10

degree of acceptance or rejection of the instructi 18
 delivery technologies 36
 dependence on support personnel 85
 design 94
 design WBT 55
 desktop teleconferencing 73
 desktop videoconferencing 71
 desktop/LAN requirements 184
 development 95
 development cost 43, 47, 48
 difficulty of Revisions 80
 digital 62
 digital knowledge repositories. 157
 digital material required 68
 disk space 154
 distance education 8
 distance teaching 8
 distance training 8
 distributed learning 10
 distribution 55
 dots per inch (dpi) 130
 durability 156
 dynamic updates 63, 84

E

e-mail 51
 earned value management system (EVMS) 174
 ease of Revision 43, 75
 ease of Use 61, 63
 effectiveness of training 126
 electronic communication 67
 electronic mail and listservs 56
 electronic repository 183
 emotions 18
 emotions, perceptions, tone, aspirations, and degr 18
 enterprise-wide distance learning 192
 estimated return on investment (ROI) 93
 evaluation 17, 95
 evaluation criteria (outcome variables) 188
 evaluation metrics 94
 evaluation model 187

existing infrastructure 154, 184

F

face-to-face interaction 26, 74, 75
feedback 26, 41, 47, 112
feedback loops in communication 22
fidelity 21
file transfer protocol 49
five levels of evaluation 190
formative data-gathering methods 187
formative evaluation 187
four levels of evaluation 191
four major steps in conducting an ROI analysis 127
frames per second 131
free software 61
freelance conversion support 121
full motion video 131
full time conversion support 122
functional and technical capability 94
future growth 63, 64

G

geographic dependence 84
geographic independence 61, 64, 75, 79
geographic reach 84
GIF 130
GIF89a 131
granularity of the analysis 98, 99
graphic images 130
graphical user interfaces 39
graphics software 146
group discussion 112
group interaction 23
group problem solving 106, 111
group training for functional teams 106
group-based interpersonal training 106
group-based psychomotor training 106

H

hands-on work/activities 105
hardware and software platforms 92
hazardous environments 18
Help Desk support 185
Help Desk tools. 153
hierarchical 24
hierarchical environment 24
High Speed Network Connections 69
HTML converters 55
HTML Knowledge 68
hybrid delivery 52, 177
hybrid delivery mechanisms 87
hyperlinks 39, 138
hypermedia 24, 50
hypermedia advantages and disadvantages 25
hypermedia characteristics 24
hypertext 24

I

images 54
implementation 95
implementation and operational costs 70
implementation costs 76, 85
implementation phase 171
IMS (Instructional Management System) 155
Increased Communication 62, 63
increased coordination 48, 67, 85
increased overall costs 66
individual attention 47
inexpensive and easy to use implementation tools 64
inexpensive Communication Tools 62
information distribution 49
Information Service Provider (ISP) 66, 69
infrastructure investments 93
institutional characteristics 188
instructional activities 109
Instructional Consistency 179
instructional design process 142
Instructional design strategies 144

instructional effectiveness 147
 instructional objective 91
 Instructional strategies 95
 instructional technologies 36
 instructional unit 117
 instructional units or modules 144
 instructor involvement 31
 instructor mediation 30
 instructor support tools 153
 instructor training 69
 instructors require training 182
 interaction between learners 42, 84
 interaction with Instructor 83
 interactions with learners 84
 interactive communication properties 21
 interactive multimedia course development 115
 interactive multimedia instructions 36
 interactive text 137
 interactivity 40, 45, 135
 Internet 7
 Internet connectivity 184
 Internet Mail 49
 internet relay chats (IRCs) 59
 interoperability 156

J

JPEG (joint photographic experts group) 130
 JPG 130

K

Knowledge 16
 knowledge 16
 Knowledge transfer 191

L

Large Scale Teleconferencing Systems 72
 large scale videoconferencing 71
 larger scale analyses 96
 learner centeredness 28, 41, 46, 61
 learner characteristics 188

learner engagement 179
 learner performance 107, 112
 learner productivity 178
 learner reaction 191
 learner support tools 153
 learner throughput 104
 learner-instructor interaction 74
 learner-learner interaction 74
 learning centers 182
 learning content repository 183
 learning environment 67, 80
 learning labs 36
 learning module 117, 145
 learning objective categories 15
 learning objectives 14, 109, 115, 135
 learning organization 155
 learning outcomes 187
 learning performance 32
 learning retention 115
 learning theories 29
 Level I courseware 137
 Level II courseware 137
 Level III courseware 139
 level of engagement 135
 life cycle training costs 124
 limited interaction 48
 limited requirements 79
 listservs 49, 51
 low speed connections 65
 lower training costs 192

M

managing records 151
 media analysis 92
 media conversion analysis 96
 media conversion analysis 92
 media richness 21
 MIDI (Musical Instrument Digital Interface) 132
 model of learning 13
 modes of learning 41, 47
 modularity 41, 46
 motivation to learn 179
 multi-curriculum courses 99
 Multi-Object Oriented MUDs (MOOs)

59
multi-user domains (MUDs) 27, 59
Multimedia Capabilities 39, 45
multimedia content development 129
multimedia development software 46
multimedia files 129

N

navigation 24, 53
network 60
network access costs 65
non-linear design 147

O

object-oriented 130
off-line work 76
ongoing cost 154
open learning 8
open learning environments 8
open university 8
operational costs 47, 75, 84
organizational impact 192
outcomes of DL 189

P

perceptions 18
periodic assessment 108
physical repository 183
physical risk 105
pilot 174
pilot project 93
pilot study 94
pixels 130
platform dependence 43, 48
platform independence 63, 64
playback technology 79
PNG 131
Postscript EPS 131
precision flying simulators 18
production personnel 85
project manager 175
project plan 141
prototype 174
prototype development 93, 148
psycho-motor 15, 107

Q

quality (fidelity) 129
quality control procedure 143
quality of material 66

R

RAM 154
rapid course revising 151
real time 83
receiving (attending) 19
reliance on electronic communication 68
reliance on information service provider 67
remediation 111
remote access tools 153
resolution 129
resource monitoring 153
response Time. 41
Return on Investment (ROI) Analysis 124, 126
reusability 63, 156
reusable learning content. 157
reusable learning objects 32
ROI analysis 127

S

Sampling rate 134
scheduling 84, 85
scheduling Flexibility 42, 46, 79
search engine 26, 138
SECAM 79
security and privacy 66, 77
security tools 153
server 60, 152
shared whiteboards 51
Shockwave® 140
simulation 116
simulation equipment 18
skill sets 181
social presence Theories 21
socioculturalism 29
specialized tools or equipment 106
splines 131

stakeholders 173
 standards 69
 startup cost 154
 storyboard 40, 45, 95, 145
 strategic plan 172
 subject matter expertise 103
 subject matter experts (SMEs) 142, 147
 summative evaluation 186
 support infrastructures 70
 synchronicity 26
 synchronous 8
 synchronous collaboration 51
 synchronous communication 150
 synchronous learning 27
 synthesis 16

T

teaching flexibility 47
 teaching strategies 36
 team building 152
 technical infrastructure 92, 115
 technology insertion
 3, 52, 100, 101, 181, 192
 technology mediation 31
 tele-learning 8
 teleconferencing 27, 109
 Telnet 49
 temporal independence
 41, 42, 61, 64, 79, 116
 three cost modeling techniques 123
 three-dimensional (3D) images 131
 TopClass 161
 total conversion 3, 101, 102
 training 5, 9
 training benefit to cost analysis 124
 training infrastructures 193
 two-dimensional graphics 131
 types of conferencing technologies 71
 types of Web-based training 51

U

Usenet 49
 user group 94
 user interface screens 145

user requirements 92

V

Value-Added Conversion 55
 valuing 19
 vectored images 131
 VHS 79
 video 146
 video and interactive TV 185
 Video clips 134
 video conferencing 51, 71
 video limitations 76
 video tele-training 27
 video teleconferencing 185
 videotapes 27, 78, 109
 virtual campus environment 176
 virtual learning 8
 virtual reality modeling language
 (VRML) 105
 virtual university 8
 viruses 65, 68
 visual display limitations 85

W

Web authoring tools 56
 Web browser 7
 Web browsing 149
 Web "chat" forums 51
 Web Course in a Box 163
 Web delivered courses 52
 Web enhanced courses 52
 Web managed courses 52
 Web-based 25
 Web-Based "chat" facilities 59
 web-based instructional systems 8
 Web-based teaching 27
 web-based training 27, 109
 WebCT 159
 Wiener's cybernetic model of communication 22